# 2020~2021 Undergraduate Catalog ;

# The University of Memphis

The online catalog can be accessed at: http://catalog.memphis.edu/index.php



### 2020~2021

## UNDERGRADUATE CATALOG

M. David Rudd, Ph.D., ABPP **President** 

UofM offers equal educational opportunity to all persons without regard to race, religion, sex, creed, color, national origin or disability. The University does not discriminate on these bases in recruitment and admission of students or in the operation of its programs and activities, as specified by federal laws and regulations.

The designated coordinators for University compliance with Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act of 1990 are the Vice President for Student Affairs and the Equal Opportunity Compliance Officer. Information in this document will be provided in alternate format upon request. University of Memphis is an Equal Opportunity/Affirmative Action University. It is committed to education of a non-racially identifiable student body.

Published annually by The University of Memphis-Office of the Registrar

# **Campus Directory**

Department	Phone Number
Academic Counseling Center	901.678.2062
Undergraduate Admissions and Orientation	901.678.2111
University & Student Business Services (Bursar)	901.678.5579
Center for Athletics Academic Services	901.678.2714
Counseling, Tutoring and Testing	901.678.2067
Dean of Students	901.678.2187
Financial Aid	901.678.4825
Honors Program	901.678.2690
President's Office	901.678.2234
Provost's Office	901.678.2119
Registrar	901.678.2810

# **About UofM**

# **Statement of Vision**

The University of Memphis is an **internationally** recognized, urban public **research** university preparing students for success in a **diverse**, **innovative**, **global** environment.

# **Our Mission**

We provide the highest quality education by focusing on research and service benefiting local and global communities.

# **Our Values**

Accountability: Integrity, transparency, excellenceand the highest standards govern everything we do.

Collaboration: We seek partnerships both within and beyond the University to enhance our actions and our outcomes.

Diversity and Inclusion: Everyone is respected, included and given the opportunity to excel.

Innovation: We consistently seek a better way, and we embrace challenges.

Service: Our purpose is to benefit our students and society through knowledge and effort.

Student Success: We provide every student with the opportunity to excel.

# **Affirmative Action**

UofM offers equal educational opportunity to all persons without regard to race, religion, sex, creed, color, national origin or disability. The University does not discriminate on these bases in recruitment and admission of students or in the operation of its programs and activities, as specified by federal laws and regulations. The designated coordinators for University compliance with Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act of 1990 are the Vice President for Student Affairs and the Equal Opportunity Compliance Officer. Information in this document will be provided in alternate format upon request. University of Memphis is an Equal Opportunity/Affirmative Action University. It is committed to education of a non-racially identifiable student body.

# **General Description**

From the opening of its doors in 1912 as a normal school for training teachers to its present status as one of Tennessee's two comprehensive universities, the University of Memphis has been thrust forward by the growth of Memphis and the Mid-South. A town oriented to a rural economy and culture in 1900 grew into a large urban and commercial center mid-century, and the city's public institution of higher learning experienced comparable growth.

The metropolitan and regional requirements for more highly trained university graduates have, of necessity, caused the University to expand all its offerings in arts and sciences, business, the fine arts, education, engineering and technology, law, and several special professional fields. Degrees range from the baccalaureate through the doctorate. Approximately 80 percent of the full-time faculty have earned the highest possible degree in their fields. The University strives to optimize its resources in its quest for excellence through teaching, research and service.

With an enrollment of over 20,000, the University of Memphis is committed to developing programs of the highest caliber, for only through such a commitment will it be a standard of quality in higher education for the citizens of our service area. As the comprehensive university of the State University and Community College System of Tennessee, the University of Memphis is striving to increase the ratio of doctoral programs it offers, which will also require an increased emphasis on research and scholarship activity. The University is committed to serving a diverse student body of all races, sexes and nationalities. Our students are expected, upon graduation, to be able to compete effectively with their counterparts from any other respected university in the nation.

# History

The roots of the University of Memphis date back to September 12,1912, with the establishment and beginning of classes at West Tennessee State Normal School, which provided for the training of primary and secondary education teachers. However, the seeds for the normal school's creation were sown three years earlier, in 1909, when the Tennessee General Assembly passed a General Education law calling for establishment and maintenance of three normal schools, one school located in each of the three grand divisions of the state.

The eastern edge of Memphis became the site for West Tennessee State Normal School, which in 1929 became West Tennessee State Teachers College. In 1941, the college expanded its liberal arts curriculum, and the name was changed to Memphis State College-an institution serving three to four thousand students. The undergraduate program was reorganized into three schools and a graduate school was added in 1951.

Memphis State achieved university status in 1957, and on July 1, 1994, the name was officially changed to the University of Memphis.

## Organization

The schools and colleges that make up the University are the Graduate School, the Cecil C. Humphreys School of Law, the School of Communication Sciences and Disorders, the School of Public Health, and seven colleges offering graduate and undergraduate programs: the College of Arts and Sciences, the Fogelman College of Business & Economics, the College of Communication and Fine Arts, the College of Education, the Herff College of Engineering, the Loewenberg College of Nursing, the Kemmons Wilson School of Hospitality and Resort Management, and the College of Professional & Liberal Studies. The University of Memphis is also home to the Helen Hardin Honors College, which offers programs for highly motivated students seeking exceptional and challenging programs of study in a variety of disciplines. The colleges, departments, and the undergraduate degree programs they offer are described in more detail in the Colleges and Degree Programs section of this catalog.

# The Memphis Community

Memphis, with a metropolitan area population of just over one million, is one of the South's largest and most attractive cities. As a primary medical, educational, communication, distribution and transportation center, Memphis offers a rich and full range of research opportunities and cultural experiences. The city, known worldwide for its musical heritage, has many fine restaurants, museums, and theaters, as well as one of the nation's largest urban park systems. Annual events include the St. Jude Liberty Bowl Football Classic, the Memphis in May International Festival, and the Federal Express St. Jude Golf Classic. The medical complex in Memphis is the South's largest and one of the nation's foremost centers of medical research. A public transportation system provides easy travel between the university and other parts of the city.

Built on bluffs overlooking the Mississippi River, Memphis is devoted to preserving its history while vigorously building its future. Clusters of stately old homes dot the city; some are still inhabited, others preserve the past as museums, some have been restored and recast into commercial establishments; all are home to images from a long-ago time.

The University's modern and beautifully landscaped campus is centrally located in an attractive residential area of Memphis, with shopping, recreation and entertainment centers nearby. In addition to the main campus facilities, the University has research and athletic training facilities and married student housing on the South Campus, as well as teaching sites throughout West Tennessee.

# **Facilities, Research, and Services**

## Academic Common Market

Participation in the Academic Common Market allows qualified students from southern states to pay in-state tuition while pursuing certain degree programs at the University of Memphis. This arrangement is available only for students whose home states do not offer the designated program. The state in which the student resides determines which of the programs offered by the University of Memphis it will make available to its students.

The Academic Common Market is sponsored by the Southern Regional Education Board (SREB). Participating states are Alabama, Arkansas, Delaware, Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, Oklahoma, South Carolina, Tennessee, Texas, Virginia, and West Virginia (Florida and Texas grant access for graduate level programs only). Current SREB common market guidelines and requirements may be found on the web at http://www.sreb.org/page/1304/academic\_common\_market.html

Students may request through their home state coordinators that additional programs be made accessible. A list of the state coordinators with their addresses and telephone numbers may be obtained from the Academic Common Market web site http://www.sreb.org/page/1304/academic\_common\_market.html

6

In addition to certification requirements which the student's state of residence may specify, the following pertain: (1) Students must be fully admitted to a degree program that has been approved as an Academic Common Market program (nondegree students are ineligible); (2) students must obtain a letter certifying residency term of entry and approval for the particular University of Memphis program from their state's Academic Common Market coordinator.

NOTE: After enrollment, students remain eligible for in-state tuition only so long as they are continuously enrolled-consecutive fall and spring termsin the same major for which they were originally certified. If students change major, they must process a Change of Major through their advisor and notify the Office of Admissions to change the Academic Common Market residency code on their records. Failure to process the Change of Major and to notify the Office of Admissions may subject the student to out-of-state fees for all subsequent terms of enrollment in classes for a major other than the one for which the student received ACM certification. Missing a fall or spring term of enrollment or a change of major requires that the student be recertified through the ACM coordinator in the student's state of residence.

## **Library Facilities**

The University of Memphis Libraries include the Ned R. McWherter Library and five branch libraries: Audiology and Speech Language Pathology, Chemistry, Earth Sciences, Mathematics, and Music, which are contiguous to the appropriate university departments.

The McWherter Library offers many services through its Reference Department, including access to both electronic and print resources and instruction in use of all resources in the University Libraries. The Periodicals Department also offers assistance in accessing electronic resources, especially electronic full-text journals. The Government Publications Department is the Regional Federal Documents Depository for the State of Tennessee Documents. The Special Collections Departments' largest collection, consisting of unique and rare manuscripts, cartographic, photographic, and printed materials, including the Mississippi Valley Collection, reflects the history and culture of the Mississippi River valley.

The University of Memphis Libraries maintains agreements with other local institutions for shared use of library collections by students, faculty, and staff. These institutions include Rhodes College, LeMoyne-Owen College, Mid-America Baptist Theological Seminary, Memphis Theological Seminary, Southwest Tennessee Community College, the University of Mississippi, Christian Brothers University and Mid-South Community College.

The University of Memphis Libraries' provides access for all students and faculty to the electronic resources provided by the Libraries, including the Libraries' catalog of its collections. Access to the website is available to all Internet users, whether at home, at an off-campus site, or at a workstation in the McWherter Library and its branch libraries.

### Information Systems

The University of Memphis has long recognized that information technology plays a central role in teaching, learning, and research. Under the leadership of the Chief Information Officer (CIO), Information Technology Services (ITS) is responsible for implementing, provisioning, and ensuring access to technologies.

A variety of technologies are used to support teaching and learning including smart classrooms and computer labs, simulation technologies, online learning technologies, and research computing facilities. Campus technology facilities can be located by visiting https://umwa.memphis.edu/trlsearch/.

Access to campus technologies are enabled and enhanced by the University's core infrastructure technologies including enterprise networks, servers, and applications. The University maintains high-bandwidth and reliable commodity internet and telecommunication services for the entire campus community. Access to the network is provided through wired and wireless connections. High-capacity and reliable network and telecommunication services are a critical component of the University's ability to provide effective support for students, faculty, and staff.

The University also recognizes the importance of high-performance computing (HPC) resources for research and education. Since 2006 the University has maintained HPC facilities on campus and refreshes the equipment on a three-year cycle. The HPC cluster supports teaching and learning by providing resources necessary for faculty and students to conduct research in computationally intensive areas.

In addition to teaching and learning technologies, ITS is also responsible for supporting the University's administrative systems, mobile application, and email services.

The ITS Helpdesk is the central point of contact for all technical support requests. The helpdesk can be reached at 901.678.8888 or http://umHelpdesk.memphis.edu.

## **Benjamin Hooks Institute for Social Change**

The Institute pursues a broad programmatic agenda of research and outreach that builds upon Dr. Hooks' lifetime of work to achieve a more just society. The Hooks Institute is committed to advancing the goals of the American Civil Rights Movement, and making Memphis a national center for the study of the Civil Rights Movement and its legacy.

### **Bureau of Business and Economic Research**

The Bureau of Business and Economic Research is the organized research and public service unit of the Fogelman College of Business and Economics. The programs of the bureau include public service to government agencies (state and local) and the business community, continuing education, and applied general research.

## **Center of Applied Psychological Research**

The Center for Applied Psychological Research supports research on problems concerning health, mental health, education, schools, crime, the environment, and children and their families. The Center also supports basic scientific research in cognitive psychology, biopsychology, social psychology, developmental psychology, and research design and statistics.

## **Center for Earthquake Research and Information**

The Center for Earthquake Research and Information was established in 1977 by the Tennessee State Legislature to provide the citizens of Tennessee, governmental agencies, and the news media such services as the following: (1) accurate, immediate reports and background information on the occurrence of regional earthquakes; (2) scientific research related to the causes and consequences of local earthquakes and to the possibility of earthquake prediction; (3) studies related to the desirability of earthquake resistant construction; (4) advice to the populace, business, government, and insurance groups on the methods, means, and feasibility of reducing earthquake damage. It operates as a research organization of the University of Memphis. It supports some undergraduate student research in seismology and geophysics and civil engineering and cooperates with the Department of Geological Sciences in offering an undergraduate degree concentration in geophysics.

## **Center for Research in Educational Policy**

The Center for Research in Educational Policy is funded by the State of Tennessee as one of five Centers of Excellence located at the University of Memphis. CREP's mission is to implement a research agenda associated with educational policies and practices in the pre K-12 public schools of Tennessee and the nation and to provide a knowledge base for use by educational practitioners and policymakers. Research outcomes are intended to not only describe the complexities of educational phenomena, but also offer recommendations for action.

Since 1989, the Center has served as a mechanism for mobilizing community and university resources to address educational problems and to meet the University's commitment to primary and secondary schools. The Center's research agenda is developed through analysis of persistent or emerging issues in schools and their communities, changes occurring in teacher education programs, and recommendations from educational authorities. In the past decade, CREP has gained national recognition for its contribution to discussions of issues such as reform of teacher education, educational equity, educational technology, school reform and restructuring, urban and multicultural education, interventions for at-risk students, and using formative evaluation methods for school improvement decision-making.

## **Center for Health Services Research**

The Center for Health Services Research is housed in the Division of Health Administration. The Center emphasizes collaborative, multi-disciplinary research focusing on issues in health care management, leadership, financing, economics, and administration. The Center's goal is to serve as a strong partner and resource for health care organizations, both public and private, in the Mid-South region.

# **Center for Manpower Studies**

The Center for Manpower Studies, located in the Fogelman College of Business and Economics, conducts research on employment and trainingrelated topics and provides technical assistance to federal, state, and local agencies. It also offers a variety of training programs for human resource development agencies throughout the southeast.

## **Edward J. Meeman Biological Station**

The Edward J. Meeman Biological Station was established in 1967 to encourage and foster scientific pursuits in natural history, ecology, and environmental biology. Located about 23 miles northeast of the main campus and adjacent to Meeman-Shelby Forest State Park in northwestern Shelby County, the 623-acre station (with laboratory, classroom, and small conference facilities) provides students and faculty from the University of Memphis, as well as visiting investigators, with a unique site for research, teaching, and service activities. The station is an integral part of the Department of Biology.

## **Ecological Research Center**

The Ecological Research Center (ERC) of the Department of Biology is organized to conduct and coordinate research, teaching, and service activities in ecology and related areas. Major areas of research include: fish culture, water quality, wildlife biology, endangered and threatened species, systematics, and physiological responses of organisms to the environment. The teaching program of the ERC provides a training program for students interested in pursuing careers in various professional fields and affords an opportunity for students to participate in activities involving contemporary environmental problems. Public service activities are primarily directed toward promoting environmental awareness and providing information and consultation services to those concerned with environmental problems.

## The Marcus W. Orr Center for the Humanities

The Center for the Humanities was founded in 1987 and renamed in 1991 in memory of Dr. Marcus W. Orr, Professor of History. Its purpose is to support teacher and course development, independent and collaborative research, and public programs that will foster an understanding of the importance of the humanities and establish a sense of intellectual community among humanities faculty at the university. The center sponsors visiting scholars, course development grants, lectures, and a Humanities Fellows Program that supports faculty scholarship.

## **Center for Research on Women**

Founded in 1982, the Center for Research on Women (CROW), located in the College of Arts and Sciences is nationally recognized for its pioneering work on race, class, and gender. CROW's mission is to conduct, promote and disseminate scholarship on women and social inequality. Its approach to research, theory and programming emphasizes the structural relationships among race, class, gender and sexual identity, particularly in the U.S. South and among women of color. CROW-affiliated faculty span the University. They are currently engaged in action-oriented, community-based research on women in Memphis and the U.S. South; historically grounded research that makes visible global processes affecting the persistence of inequalities in the U.S. South; and the development of feminist theories and methods. CROW offers postdoctoral fellowships to scholars studying race and gender in the U.S. South, and provides graduate assistantships to students enrolled in the M.A. program in sociology.

## **Center for Urban Research and Extension**

The Center for Urban Research and Extension provides technical assistance, research and other services for neighborhood improvement in three Memphis Enterprise Neighborhoods. The Center supports the City of Memphis' Enterprise Community program, and collaborates with neighborhood residents as they embark upon various efforts in revitalizing their neighborhood. Chucalissa Indian Village and Museum (C. H. Nash Museum)

This partly reconstructed prehistoric Indian village on its original site and the museum are operated by the Department of Anthropology as an educational and research facility. The indoor and outdoor exhibits are designed to reconstruct prehistoric Indian life in the Mid-South. Students are trained in the techniques of excavation, restoration and museum operations. The courses taught are listed in the Department of Anthropology offerings. Chucalissa is located 17 miles from the main campus.

# **Integrated Microscopy Center**

The Integrated Microscopy Center provides facilities and expertise in the field of light, coufocal and electron microscopy. Users of the center include researchers and graduate students in the biological and physical sciences.

9

## The Institute of Egyptian Art and Archaeology

The Institute, founded in 1984 and designated a Tennessee Center of Excellence in 1985, is a component of the Art Department at the University of Memphis. The Institute is dedicated to the study of the art and culture of ancient Egypt through teaching, research, exhibition, and excavation. It is staffed by egyptologists and art historians associated with the department's art history program. Its research library consists of more than 6000 egyptological books and periodicals including rare and out-of-print volumes. The Art Museum at the University of Memphis houses the Institute's growing collection of Egyptian antiquities, the largest in the Mid-South. The Institute also sponsors an epigraphic project at The Great Hypostyle Hall of Karnak Temple in Luxor, Egypt, and the excavation of the tomb of Pharaoh Amenmessee in the Valley of the Kings.

## **Institute for Intelligent Systems**

The Institute is designed to bring together research and training in the broad areas of cognitive science, complex dynamical systems, artificial intelligence, and massively parallel computing (neural computing). Current research includes basic research supported by grants from funding agencies and applied research supported by industrial/governmental contracts. Ideas and techniques for research are gathered from the disciplines of cognitive psychology, computer science, philosophy of mind, neuroscience, linguistics, and mathematics. Training should include graduate courses, thesis and dissertation research, and industrial training in the form of workshops, seminars, and employee research participation.

## **Regional Economic Development Center (REDC)**

The Regional Economic Development Center represents the University in its outreach function in the field of economic development planning. In providing technical and management assistance to the public and private sectors, the Center also serves as a laboratory for interdisciplinary research and service by faculty and graduate students in solving problems of urban and regional development. The Center's professional planning staff have academic appointments and teach courses in City and Regional Planning. REDC is an outreach unit of the School of Urban Affairs and Public Policy.

## **Memphis Speech and Hearing Center**

The Memphis Speech and Hearing Center is located on the Park Avenue campus in the Community Health Building at 4055 North Park Loop. This facility became affiliated with the University in 1967. It serves children and adults with communication disorders. Students at the University are seen at no charge. The University administers and operates the center in cooperation with Methodist LeBonheur and the Board of Directors of the Memphis Speech and Hearing Center, Inc.

## **Other Research**

Units In addition to the units described above, the University of Memphis also recognizes a wide array of other research- oriented units:

- Anthropological Research Center
- Barbara K. Lipman Early Childhood School and Research Institute
- Bureau of Sport and Leisure Commerce
- Center of Community Health (joint with UT Memphis)
- Center for River Studies
- Computational Research of Material Institute
- Exercise and Sport Science Laboratories
- Federal Express Center for Cycle Time Research
- Groundwater Institute
- Highwater Recording Company
- Institute for Egyptian Art and Archaeology
- Institute for Gambling Education and Research
- Institute for Governmental Studies and Research
- National Science Foundation Industry/University Cooperative Research Center for Bio-Surfaces Site
   The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- Neuropsychology Research Laboratory
- Oral History Research Office
- Religious News Association Archives
- Robert Wang Center for International Business
- Southern Music Archive
- Transportation Studies Institute
- W.H. Feinstone Center for Genomic Research

### **Recognized Centers and Chairs of Excellence**

The University of Memphis has been designated by the Tennessee Higher Education Commission as a location for centers and chairs of excellence. The units listed below receive special funding by the State in recognition of their status.

### **Centers of Excellence**

- Center for Applied Psychological Research
- Center for Earthquake Research and Information
- Center for Research Initiatives and Strategies for the Communicatively Impaired
- Center for Research in Educational Policy
- Center of Excellence in Egyptian Art and Archaeology

### **Chairs of Excellence**

The University of Memphis and the Office of the Provost are pleased to have the following faculty in Chairs of Excellence:

#### **College of Arts and Sciences**

#### W. Harry Feinstone Chair in Molecular Biology

Dr. Tom Sutter

Jabie Sanford Hardin III Chair in Combinatorics

Dr. Bela Bollobas

**Lillian and Morrie Moss Chair in Computer Science** Dr. Santosh Kumar

Lillian and Morrie Moss Chair in Philosophy Dr. Shaun Gallagher

Lillian and Morrie Moss Chair in Psychology Dr. J. Gayle Beck

#### School of Communication Sciences and Disorders

**Plough Chair in Audiology and Speech-Language Pathology** Dr. D. Kimbrough Oller

#### **Fogelman College of Business and Economics**

William N. Morris Chair in International Economics Dr. David Kemme

### Robert Wang Chair in International Business

Dr. Ben Kedia

### **Sales and Marketing Executives Inc. Chair in Sales** Dr. Rajiv Grover

**Thompson-Hill Chair in Accounting** Dr. Zabihollah "Zabi" Rezaee

### **Morris S. Fogelman Chair in Real Estate** Dr. Mark A. Sunderman

### Wunderlich Chair in Finance

Dr. Thomas H. McInish

**The University of Memphis Chair in Free Enterprise Management** Dr. Peter Wright

### **Federal Express Chair in Management Information Systems** Dr. William Kettinger

### **College of Communication and Fine Arts**

**Dorothy Kayser Hohenberg Chair of Art History** Dr. Sherry Lindquist

Helen and Jabie Hardin Chair of Economics/Managerial Journalism Dr. Otis Sanford

### **College of Education**

**Lillian and Morrie Moss Chair of Excellence in Urban Education** Dr. Beverly Cross

### Herff College of Engineering

Herbert Herff Chair in Biomedical Engineering (II) Dr. Gary Bowlin

### Cecil C. Humphreys School of Law

Herbert Herff Chair in Law Dr. Andrew J. McClurg

### Loewenberg College of Nursing

### William A. and Ruth F. Loewenberg Chair in Nursing Dr. Marcy Purnell

For the most up-to-date Chairs of Excellence list, please visit http://www.memphis.edu/aa/recognition/chairsexcellence/.

### **Academic Personnel Services**

The Office of Academic Personnel Services conducts the University of Memphis' program for student evaluation of instruction. The Student Evaluation of Teaching Effectiveness (SETE) uses a comprehensive approach for collecting, analyzing, and reporting student reactions to certain aspects of classroom instruction. All teaching faculty are required to participate in the student evaluation program. SETE is not to be administered during the week of final exams. Faculty receive the completed forms and a computer generated summary at the beginning of the following semester. These documents, which are an important part of the dossier prepared for tenure and promotion, also provide useful information to individual faculty members for course development and/or improvement of instruction.

# **International Students Office in the Center for International Programs and Services**

The Office of International Students advises international students regarding immigration, health, housing, social, personal, and financial concerns. Besides advising individual students, the office advises the International Students Council. The council represents six national student associations: the African Student Association, the Chinese Student Association, the Indian Student Association, the Korean Student Association, the Malaysian Student Association, and the Muslim Student Association. The office also organizes a four-day orientation for new students each semester as well as social and cultural events that encourage international students' involvement in the campus community and help ease their transition into the American way of life. International Night, the biggest event of the year, provides an opportunity for the international students to share their traditional food and entertainment with the campus and the Memphis community.

# **Psychological Services Center**

The Psychological Services Center, located on the first floor of the Psychology Building, offers both psychological evaluations and therapeutic services to children and adults.

## The University of Memphis Alumni Association

The University of Memphis Alumni Association engages alumni, former students and friends in three challenges: advocating the ideals of the University, advancing its welfare and fostering life-long relationships with the institution. Visit the University of Memphis Alumni Association website for additional information.

## **Oak Ridge Associated Universities**

Since 1971, students and faculty of the University of Memphis have benefited from the University's membership in Oak Ridge Associated Universities (ORAU) is a consortium of 88 colleges and universities and a contractor for the United States Department of Energy (DOE) located in Oak Ridge, Tennessee. ORAU works with its member institutions to help their students and faculty gain access to federal research facilities throughout the country; to keep its members informed about opportunities for fellowship, scholarship, and research appointments; and to organize research alliances among its members.

Through the Oak Ridge Institute for Science and Education (ORISE), the DOE facility that ORAU operates, undergraduates, graduates, postgraduates, as well as faculty enjoy access to a multitude of opportunities for study and research. Students can participate in programs covering a wide variety of disciplines including business, earth sciences, epidemiology, engineering, physics, pharmacology, ocean sciences, biomedical sciences, nuclear chemistry, and mathematics. Appointment and program length range from one month to four years. Many of these programs are especially designed to increase the numbers of underrepresented minority students pursuing degrees in science- and engineering-related disciplines.

A comprehensive listing of these programs and other opportunities, their disciplines, and details on locations and benefits can be found in the ORISE Catalog of Education and Training Programs, which is available at http://orise.orau.gov/default.aspx, or by calling either of the contacts below.

ORAU's Office of Partnership Development seeks opportunities for partnerships and alliances among ORAU's members, private industry, and major federal facilities. Activities include faculty development programs, such as the Ralph E. Powe Junior Faculty Enhancement Awards, the Visiting Industrial Scholars Program, consortium research funding initiatives, faculty research and support programs as well as services to chief research officers.

For more information about ORAU and its programs, contact Andrew Meyers, Vice Provost for Research, ORAU Councilor for the University of Memphis; Monnie E. Champion, ORAU Corporate Secretary, at 423.576.3306; or ORAU at http://www.orau.gov.

# **Extended Programs**

The Office of Public Service serves as a prime contact for individuals and organizations outside the University. Through this office, access may be gained to University facilities and resources.

The Memphis Small Business Development Center is organized to provide business development services to new and existing small business firms throughout West Tennessee. These services add to the economic development efforts of the local communities by adding and retaining employment. Special attention is given to women, minority, and veteran-owned businesses.

The University of Memphis Lambuth Campus offers a wide variety of undergraduate and graduate courses and degree programs to students living in the Jackson area.

The Continuing Education Short Course Program serves as an important link to the Memphis community, providing comprehensive, non-credit programs ranging from professional development to personal enrichment. The program is designed to narrow the education gap left by the degree-awarding academic programs at the University of Memphis, thus complementing the University's mission of service to the community. The program is strongly service-oriented, providing general interest instruction to learners of all ages, regardless of their educational background. The Short Course Continuing Education product is high quality, affordable, and requires no formal admission to the University.

The Keep Tennessee Beautiful program, established in 1983, serves as the state Keep America Beautiful agency and state resource center for litter prevention and proper solid waste management education. Keep Tennessee Beautiful is funded by Tennessee Department of Transportation.

# **The Graduate School**

The University of Memphis is a Doctoral Extensive Research/High Activity university. The Graduate School is the center of advanced study and research within the University. The basic objectives of the Graduate School are:

- To preserve and disseminate knowledge;
- To extend knowledge through research; and
- To prepare men and women to assume responsible and useful roles in a changing society.

The Doctor of Philosophy degree is awarded in audiology and speech-language pathology, biology, biomedical engineering, business administration, chemistry, communication, computer science, counseling psychology, earth sciences, educational psychology and research, engineering, english, history, mathematical sciences, music, philosophy, psychology, and social and behavioral sciences. The degrees of Doctor of Audiology, Doctor of Education, and Doctor of Musical Arts are awarded by the School of Communication Sciences and Disorders, the College of Education, and the College of Communication and Fine Arts, respectively. The College of Education also awards the degree of Education Specialist with a major in education. The Cecil C. Humphreys School of Law awards the Juris Doctor degree.

Masters programs are offered in fifty-three major areas through seven colleges and four schools. The degrees include Master of Arts, Master of Science, Master of Architecture, Master of Arts in Liberal Studies, Master of Arts in Teaching, Master of Business Administration, International Master of Business Administration, Master of City and Regional Planning, Master of Education, Master of Fine Arts, Master of Health Administration, Master of Professional Studies, Master of Public Administration, Master of Science in Nursing.

### Graduate Certificates are offered in:

- African American Literature Graduate Certificate
- Analytical Chemistry Graduate Certificate
- Applied Lean Leadership Graduate Certificate
- Augmentative and Alternative Communication (AAC) Graduate Certificate
- Autism Studies Graduate Certificate
- Aviation Human Factors Graduate Certificate
- Bioinformatics Graduate Certificate
- Business Information Assurance Graduate Certificate
- Business Project Management Graduate Certificate
- Career and College Counseling Graduate Certificate
- Clinical Mental Health Counseling Graduate Certificate
- Cognitive Science Graduate Certificate

- Cyber Security and Information Assurance Graduate Certificate
- Data Analytics for Management Graduate Certificate
- Data Analytics for Technology Graduate Certificate
- Data Science Graduate Certificate
- Disabilities Studies Graduate Certificate
- Distance Dietetics Internship Graduate Certificate
- Entrepreneurial Journalism Graduate Certificate
- Faith and Health Graduate Certificate
- Freight Transportation Graduate Certificate
- Geographic Information Systems Graduate Certificate
- Health Analytics Graduate Certificate
- Health Systems Leadership Graduate Certificate
- Hospitality Management Specialist Graduate Certificate
- Imaging and Signal Processing Graduate Certificate
- Instructional Design and Technology Design and Development Track, Graduate Certificate
- Instructional Design and Technology K-12 Educational Technology Track, Graduate Certificate
- Liberal Studies Graduate Certificate
- Literacy Leadership and Coaching Graduate Certificate
- Local Government Management Graduate Certificate
- Mathematics Education Graduate Certificate
- Multi-Tier Systems of Support Graduate Certificate
- Multimedia Storytelling Graduate Certificate
- Museum Studies Graduate Certificate
- Music Artist Diploma Certificate
- Organic Chemistry Graduate Certificate
- Packaging Engineering Graduate Certificate
- Philanthropy and Nonprofit Leadership Graduate Certificate
- Population Health Graduate Certificate
- Qualitative Studies in Education Graduate Certificate
- Quantitative Studies in Educational Research Graduate Certificate
- School Counseling Graduate Certificate
- School Library Information Specialist Graduate Certificate
- School Social Work Graduate Certificate
- Social Media Analysis and Strategy Graduate Certificate
- Software Testing Graduate Certificate
- Sport Nutrition and Dietary Supplementation Graduate Certificate
- STEM (Science, Technology, Engineering, and Mathematics) Teacher Leadership Graduate Certificate
- Strategic Leadership Graduate Certificate
- Teacher Leader Certificate
- Teaching English as a Second/Foreign Language Graduate Certificate
- Teaching of Mathematics Graduate Certificate
- Urban Education Graduate Certificate
- Women's and Gender Studies Graduate Certificate
- Writing Studies Graduate Certificate

Visit the Graduate School at http://www.memphis.edu/gradschool/

# **Cecil C. Humphreys School of Law**

The Cecil C. Humphreys School of Law offers a program of instruction leading to the degree of Juris Doctor.

Admission to the Cecil C. Humphreys School of Law is on a selective basis. To be eligible for admission, a student must have received a bachelor's degree from an accredited college or university and must have made a satisfactory score on the Law School Admission Test. Questions concerning additional admissions requirements should be addressed to the Assistant Dean for Admissions, Recruitment, and Scholarships at The online catalog can be accessed at: http://catalog.memphis.edu/index.php

http://www.memphis.edu/law/ The regulations and policies of the School of Law are set out in greater detail in the Law School Catalog, a separate publication of the University of Memphis Catalog.

15

# **UofM Global**

UofM Global offers a large selection of fully online undergraduate and graduate degree programs.

# **About Catalog**

The UofM catalog is made available electronically by the University of Memphis. Requirements in this catalog are valid for students whose initial enrollment occurs Fall 2020-Summer 2021. This catalog is valid through Summer 2027.

# **Online Catalog Features**

- 1. The UofM online catalog offers a unique feature called My Portfolio.
- 2. My Portfolio allows you to record and track your favorite programs, courses, and other areas of the catalog that interest you.
- 3. The catalog is searchable using keywords for the categories: program, courses, other catalog content or entire catalog.
- 4. Each course and program page is printable.

# **My Portfolio**

- 1. The My Portfolio link is located in the left navigation menu of the catalog.
- 2. To create your portfolio account, click on the My Portfolio link and follow the directions.
- 3. To access your portfolio account at any time, click on the **My Portfolio** link
- 4. There are "Add to Portfolio" links located throughout the online catalog for your convenience. These links allow you to add program descriptions, requirements, and courses to your portfolio for future reference.
- 5. Please consult an advisor to ensure that you are storing information within your portfolio that is relevant to your catalog year.

# **Catalog Applicability:**

The UofM catalog is made available electronically by the University of Memphis. Requirements in this catalog are valid for students whose initial enrollment occurs Fall 2020-Summer 2021. This catalog is valid through Summer 2027.

The University of Memphis (UofM) reserves the right to cancel or alter any part of this catalog without notice (subject to the following): The course offerings and requirements of the University of Memphis are continually under examination and revision. This catalog presents the offerings and requirements in effect at the time of publication, but is no guarantee that they will not be changed or revoked. The specific courses or activities constituting the degree requirements for any programs are subject to state contractual terms and does not constitute a contract between the student and the UofM.

UofM reserves the right to make changes as required in course offerings, curricula, academic policies and other rules and regulations affecting students to be effective whenever determined by the institution. These changes will govern current and formerly enrolled students. Enrollment of all students is subject to these conditions. Any fees, charges or costs, and all academic regulations set forth in this catalog are subject to change at any time, and all courses, programs, and activities described in this catalog are subject to cancellation or termination by the UofM at any time.

# **General Information:**

The catalog will be published annually by March and only approved programs, minors, concentrations, and courses will appear in the latest production of the catalog. A printed copy of the catalog is no longer available; however, a print-friendly capability of the catalog management system is offered and available.

# **Submission Timeline:**

University Undergraduate Curriculum (UUC) meetings are held the second Friday of each month. From September to February, our curriculum season, the catalog is in production for the next academic year for curriculum updates and proposals via Curriculog<sup>™</sup>. Last date for proposals for an academic year will be the second week of January following a publishing date by March. Final approval for changes will be at the discretion of the managers of the catalog content. All revisions and updates have an effective term at the start of an academic year, which is our Fall session.

Please Note: Once the University of Memphis online catalog is published and locked only minor revisions, by catalog managers, are allowed to correct inaccuracies after a curriculum season has ended.

# **Submitting Updates:**

Editors of their college and school sections of the catalog will have from September until the end of February to make revisions to their respective areas in the catalog after each UUC meeting has concluded. Editors will be responsible and only have access to their specific content areas of the catalog. However, editors will also have access to make minor revisions throughout the curriculum season from September to February. When changes are completed in Acalog<sup>TM</sup> please use the "Complete Audit Event Alert" feature in Acalog<sup>TM</sup> and select "Registrar Group" to send notification of an audit item. You may add comments to this section, if needed.

Deans, Chairs, and Non-Academic sections will be provided a preview of their content for any revisions before final publication.

Managers are system administrators of the catalog and can make edits and updates as needed. For departments and schools who do not have a designee a catalog manager will be responsible for adding their updates.

Reviewers have read-only access to an unpublished catalog during the curriculum season.

Courses will be added only by the Registrar Group. Please remember course descriptions should be clear and must be indicative of the course title.

# **Catalog Style Guideline:**

The catalog is not intended as a guideline for academic writing. The editorial style is for university-related matters, such as the approved names of schools, colleges, departments, and service areas.

# **Contact Us:**

The management of the catalog content works in conjunction with the Provost, UUC, colleges, and department personnel at the University of Memphis for accuracy. We reserve the right to make changes to the catalog as needed. You may contact us at catalog@memphis.edu for questions and concerns.

# **Catalog Applicability**

The UofM catalog is made available electronically by the University of Memphis. Requirements in this catalog are valid for students whose initial enrollment occurs Fall 2020-Summer 2021. This catalog is valid through Summer 2027.

# **Academic Program Accreditation**

The University of Memphis is accredited by the Southern Association of Colleges and Schools Commission on Colleges to award bachelor's, first professional, master's, educational specialist's, doctoral degrees, and graduate certificates. Contact the Commission on Colleges at 1866 Southern Lane, Decatur, Georgia 30033-4097 or call 404.679.4500 for questions about the accreditation of the University of Memphis.

The various colleges, schools and departments and/or the individual programs are accredited by the following appropriate accrediting agencies as documented at https://www.memphis.edu/ieaaa/institutional\_effectiveness/

Academic Program	Degree Level	Accrediting Agency	Accreditation Cycle - Begin		Next Site Visit	Accreditation Letter Date	Accredited
ECONOMICS	4.2.MA	AACSB	2016	2021	2020- 21	20-May-16	Yes
BUSINESS ADMINISTRATION	4.2.MBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
BUSINESS ADMINISTRATION	4.2.MS	AACSB	2016	2021	2020- 21	20-May-16	Yes
BUSINESS ADMINISTRATION	4.4.PhD	AACSB	2016	2021	2020- 21	20-May-16	Yes
MANAGEMENT	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
SUPPLY CHAIN MGMT	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
ACCOUNTING	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
ACCOUNTING	4.2.MS	AACSB	2016	2021	2020- 21	20-May-16	Yes
BUSINESS ECONOMICS	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
FINANCE	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
HOSPITALITY & RESORT MGMT	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
INTERNATIONAL BUSINESS	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
INTL MASTERS OF BUSINESS ADMIN	4.2IMBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
BUSINESS INFORMATION	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes

Academic Program	Degree Level	Accrediting Agency	Accreditation Cycle - Begin		Next Site Visit	Accreditation Letter Date	Accredited
AND TECHNOLOGY							
MARKETING MANAGEMENT	2.5.BBA	AACSB	2016	2021	2020- 21	20-May-16	Yes
LAW	3.1.JD	ABA	2015	2020	2020- 21	4-Nov-16	Yes
COMPUTER SCIENCE	2.5.BS	ABET/CAC	2019	2025	2025	28-Aug-19	Yes
BIOMEDICAL ENGINEERING	2.2BSBE	ABET	2016	2022	2022	31-Aug-16	Yes
CIVIL ENGINEERING	2.5.BSCE	ABET	2016	2022	2022	31-Aug-16	Yes
COMPUTER ENGINEERING	2.5.BSCPE	ABET	2016	2022	2022	31-Aug-16	Yes
ELECTRICAL ENGINEERING	2.5.BSEE	ABET	2016	2022	2022	31-Aug-16	Yes
MECHANICAL ENGINEERING	2.5.BSME	ABET	2016	2022	2022	31-Aug-16	Yes
ENGINEERING TECHNOLOGY	2.5.BSET	ABET	2016	2022	2022	31-Aug-16	Yes
JOURNALISM	2.5.BA	ACEJMC	2019	2025	2024- 25	9-May-19	Yes
PUBLIC RELATIONS	2.5 BA	ACEJMC	2019	2025	2024- 25	9-May-19	Yes
ADVERTISING	2.5 BA	ACEJMC	2019	2025	2024- 25	9-May-19	Yes
CHEMISTRY	2.5.BSCH	ACS	2010	Continuous		15-Apr-14	Yes
CITY & REGIONAL PLANNING	4.2.MCRP	ACSP	2014	2020	2020	12-Dec-13	Yes
NUTRITION	4.2.MS	ACEND	2015	2023	2023	12-Aug-16	Yes
PSYCHOLOGY	4.4.PHD	APA	2015	2021	2021	16-Dec-15	Yes
COUNSELING PSYCHOLOGY	4.4.PHD	APA	2015	2021	2021	21-Jul-18	Yes

Academic Program	Degree Level	Accrediting Agency	Accreditation Cycle - Begin	Accreditation Cycle - End	Next Site Visit	Accreditation Letter Date	Accredited
AUDIOLOGY	4.4.AUD	AAASP	2018	2026	2026	9-Mar-11	Yes
SPEECH- LANGUAGE PATHOLOGY	4.2.MA	AAASP	2018	2026	2026	9-Mar-11	Yes
COUNSELOR EDUCATION AND SUPERVISION	4.4 PhD	CACREP	2018	2025	2025	25-Jan-19	Yes
HEALTH ADMINISTRATION	4.2.MHA	CAHME	2012	2019	Fall 2019	16-May-12	Yes
NURSING	2.5.BSN	CCNE	2009	2019	2019	24-May-10	Yes
NURSING	4.2MSN	CCNE	2009	2019	2019	24-May-10	Yes
EPIDEMIOLOGY	4.4PHD	СЕРН	2015	2020	2020	18-Jun-15	Yes
HEALTH SYSTEMS & POLICY	4.4PHD	СЕРН	2015	2020	2020	18-Jun-15	Yes
PUBLIC HEALTH	4.2MPH	СЕРН	2015	2020	2020	18-Jun-15	Yes
SOCIAL AND BEHAVIORAL SCIENCES	4.4PHD	СЕРН	2015	2020	2020	18-Jun-15	Yes
SOCIAL WORK	4.2MSW	CSWE	2018	2026	2026	12-Mar-18	Yes
SOCIAL WORK	2.5.BA	CSWE	2013	2021	2021	25-Feb-13	Yes
INTERIOR DESIGN	2.5BFA	CIDA	2015	2021	Spring 2021	22-Apr-15	Yes
ARCHITECTURE	4.2MaRCH	NAAB	2015	2023	2023	30-Jul-15	Yes
ART	4.2.MFA	NASAD	2009	2017	2019	3-Jun-14	Yes
ART	2.5.BFA	NASAD	2009	2017	2019	3-Jun-14	Yes
CIDA	2015	2021	2021	22-Apr-15			
ART HISTORY	2.5.BA	NASAD	2009	2017	2019	3-Jun-14	Yes
ART HISTORY	4.2.MA	NASAD	2009	2017	2019	3-Jun-14	Yes
MUSIC	2.5.BM	NASM	2014	2024-25	2024- 25	5-Jul-17	Yes

Academic Program	Degree Level	Accrediting Agency	Accreditation Cycle - Begin	Accreditation Cycle - End	Next Site Visit	Accreditation Letter Date	Accredited
MUSIC	4.2.MMU	NASM	2014	2024-25	2024- 25	5-Jul-17	Yes
MUSIC	4.4.DMA	NASM	2014	2024-25	2024- 25	5-Jul-17	Yes
MUSIC	4.4.PHD	NASM	2014	2024-25	2024- 25	5-Jul-17	Yes
MUSIC INDUSTRY	2.5.BM	NASM	2014	2024-25	2024- 25	5-Jul-17	Yes
PUBLIC ADMINISTRATION	4.2.MPA	NASPAA	2016	2023	2023	15-Jul-16	Yes
THEATRE	2.5.BFA	NAST	2016	2027	2026- 27	24-Apr-18	Yes
THEATRE	4.2.MFA	NAST	2016	2027	2026- 27	24-Apr-18	Yes
EDUCATION	4.3.EDS	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
INSTRUCT & CURRIC LEADERSHIP	4.4.EDD	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
INSTRUCT & CURRIC LEADERSHIP	4.2.MAT	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
INSTRUCT & CURRIC LEADERSHIP	4.2.MS	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
LEADERSHIP & POLICY STUDIES	4.2.MS	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
LEADERSHIP & POLICY STUDIES	4.4.EDD	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
HIGHER & ADULT EDUCATION	4.4.EDD	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
TEACHING ALL LEARNERS	2.5.BSED	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
COUNSELING	4.2.MS	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
CACREP	2018	2025	2025	25-Jan-19			

Academic Program	Degree Level	Accrediting Agency	Accreditation Cycle - Begin		Next Site Visit	Accreditation Letter Date	Accredited
INTEGRATIVE STUDIES	2.5.BSED	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
HUMAN DEVELOP & LEARNING	2.5.BSED	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
PHYSICAL EDUC TEACHER EDUC	2.5.BSED	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
SCHOOL PSYCHOLOGY	4.2.MA	NCATE	2016	2022	Spring 2022	1-Oct-16	Yes
UNIVERSITY OF MEMPHIS		SACSCOC	2016	2025	2025		Yes

# **Academic Regulations**

# Appeals

Students have the right to appeal decisions made by University officials in the implementation of University policy. If a student feels that individual circumstances warrant an appeal, the request for appeal must be filed in the University office responsible for the implementation of that policy or the office specified in the policy statement.

# **Class Attendance**

Instructors may use class attendance in computing grades. If they choose to do so, they must present all students attending the first and second class meetings with a complete written statement of their policy, detailing the weight of attendance in determining the final grade.

A student who is absent from the final examination without the permission of the teacher incurs a grade of "F" on the examination and may, depending on the weight of the examination in determining the final grade, incur a grade of "F" for the course.

On the 1st day of classes for both the fall and spring semesters, instructors will begin recording attendance. This is required for financial aid. After this process is underway, students can check any reported attendance on Student Self-Service. Students accept both fee and grade liability at the time of registration. Students who do not attend classes are responsible for processing an official drop/withdrawal on Student Self Service. In order to avoid fee or grade liability, students must drop/withdraw prior to the first day of classes for the session in which the course is taught.

Students who stop attending will be assigned a grade of "F" in courses from which they have not officially withdrawn. Instructors report the last known date of attendance as the student's "unofficial withdrawal date."

# **Adding and Dropping Courses**

After the official registration period is over, students may make adjustments in their schedules through the process of adding and/or dropping courses. Courses dropped through the 14th calendar day of sessions seven weeks or longer, or the 7th calendar day of sessions shorter than seven weeks; will not be shown on the student's permanent record. Courses dropped after these days will be shown on the permanent record with withdrawal grades of "W". A student may drop any course or courses up through the last day to drop specified in the University Calendar for that session. Requests for exceptions must be made by the end of the next regular term following the term in which the grade was assigned, and normally only as part of a request for withdrawal from the University. Exceptions are made only by the dean in the college in which the student is earning a degree, or by the dean's designee, and only on the basis of such extenuating circumstances as serious personal illness and relocation because of employment. To stop attending a class without officially dropping the course incurs the grade of "F."

A course may be added late only upon permission of the dean or designee in the college of the student's major, or the Academic Counseling Center for undeclared students. The student must also have the written permission of the course instructor.

# Late Registration Policy

The University of Memphis allows late registration for a short period of time after the regular registration period has ended. The dates and deadlines vary by semester and can be determined by consulting the appropriate semester within the "Dates & Deadlines" calendar of the University's academic calendar. This policy only applies to students whose academic status is Good Standing or Academic Warning.

Students on Academic Probation, transferring on Probation, or returning from Academic Suspension, who are admitted to the University of Memphis but have not enrolled in classes, must be registered for classes prior to the first day of class. Research on the impact of registering late for classes has generally concluded that late registrants have higher course withdrawal rates, lower grade point averages, and lower retention rates. In an effort to retain students, improve academic success, and decrease the number of students placed on Academic Suspension, the University of Memphis recognizes that registering before classes begin is essential to promoting those goals.

# Withdrawal From University

Any student who wishes to officially withdraw from the University may do so on the web, or in person through the Office of the Registrar in Student and Faculty Services, room 003, Wilder Tower. Failure to officially withdraw will result in grades of "F" for the courses in which the student is enrolled.

23

NOTE: Withdrawal is not permitted beyond the last day to withdraw specified in the University Calendar for that term or session. Requests for exceptions must be made by the end of the next regular term following the term in which the grade was assigned. Exceptions are made to this policy only in cases of such extreme circumstances as serious personal illness and relocation because of employment. Withdrawal requests after the deadline should be filed in the dean's office of the student's major college or the Academic Counseling Center for students with no declared major.

## Late and Retroactive Withdrawals

After the drop deadline for a semester, students whose reasons for withdrawal meet the guidelines below for "extreme circumstances" must submit a Withdrawal Petition to the college of their major with the information requested from each instructor and with appropriate written documentation.

Petitions to withdraw from courses that ended more than one regular (fall or spring) semester after the semester for which the withdrawal is requested must be submitted to the Registrar's Office (located in Wilder Tower 003) or by email to darkeel@memphis.edu.

### **Guidelines and Form:**

- 1. Late and Retroactive Withdrawal Guidelines can be found at the following link: Late and Retroactive Withdrawal Guidelines
- 2. Petition Form can be found here: Withdrawal Petition Form

### **Enrollment Transactions**

Enrollment transactions include registration, adding and dropping courses, and withdrawing from the university. The official date shall be the date that the request is submitted to the Office of the Registrar, subject to the final review and approval of the Vice Provost for Enrollment Services. If the final review reveals any apparent violation of the University's academic regulations and/or contractual relationships between the University and the student, the Vice Provost for Enrollment Services has the authority to suspend the transaction pending joint review with the college dean, the department chair, and the student's academic advisor. If the joint review verifies the legitimacy of the transaction, the official date will be that originally established. If the joint review culminates in a finding that academic regulations and/or contractual relationships have been violated, the entire transaction may be permanently invalidated.

# **Classification of Students**

Classification of students is based on the number of college-level credit hours earned (excluding developmental) as shown in the following table.

Classification	Semester Hours
Freshman	0-29
Sophomore	30-59
Junior	60-89
Senior	90 or more
Special	Students not working on a degree

In order to avoid a possible delay in graduation, students who have completed the required number of hours to be classified as juniors but who have not completed their basic requirements in the lower division should schedule these uncompleted requirements during the first semester in which such courses are available.

# Credit Hours, Full-Time Classification, and Maximum Load

The unit of credit at the University of Memphis is the semester hour. A semester hour is defined as the credit earned for the successful completion of one hour per week in class for one semester; or two to three hours per week of laboratory for one semester. (A course which gives three semester hours credit will normally meet for three lecture or recitation hours per week, or for two lecture or recitation hours and two-three laboratory hours per week; or for some other combination of these.) Each lecture hour presupposes a minimum of two hours preparation on the part of the student.

The minimum credit hour load for classification as a full-time student is 12 credit hours for a term (all sessions combined for fall, spring, or summer). The maximum loads are found on the maximum credit load page by clicking here. The maximum credit hour load includes all course enrollments for any term, both at the University of Memphis and any concurrent enrollment at other institutions. It does not include credit by examination. No student is permitted to enroll for correspondence or extension courses while carrying a maximum credit hour load.

# **Maximum Credit Hour Load**

	Maximum Hours*
Fall or Spring	20.5
Summer	23
Individual Session Maximum	S
First or Second Fall or Spring	10
First or Second Summer	9
Full Summer	16

Enrollment of less than 12 hours total (all sessions) for any Fall, Spring, or Summer term is defined as being less than full-time. Maximum hours should not exceed individual session limits or the term maximum.

\* Students must have approval from the appropriate official in their degree-granting college for hours in excess of the maximum.

NOTE: ID card validation of full-time for student activity purposes is based on a minimum of six credit hours per semester and does not necessarily constitute a full-time academic load.

# **Academic Standards - Grades and Quality Points**

## **Grades and Quality Points**

At the end of each session, instructors report to the Office of the Registrar the standing of all students in their classes. The grade of a student in any course is determined by class standing and examination, combined in such proportion as the instructor in charge of the course may decide. The instructor's grading scale will be provided to students on the course syllabus.

The instructor's evaluation of the student's work is expressed by the following grades which are converted to quality points for the purpose of averaging grades.

Grade	Quality Points
A+	4.00
А	4.00
A-	3.84
B+	3.33
В	3.00

В-	2.67
C+	2.33
С	2.00
C-	1.67
D+	1.33
D	1.00
F	0.00
W (Withdrew)	0.00
I (Incomplete)	0.00
NR, None Reported	0.00
NC, No Credit	0.00
*IP, In Progress	0.00
*S, Satisfactory	0.00
*U, Unsatisfactory	0.00
AU, Audit	0.00
CR, Credit	0.00

\*Grades used to postpone or suspend course completion include "I" (Incomplete), "IP" (In Progress), and "W" (Withdrawn).

Independent studies courses, student teaching, workshops, practical, and internships should be graded "A-F, IP" or "S/U, IP." A grade of "S," "U," or "IP" does not carry any quality points and is not included in computing GPA. All courses for which the student is registered are recorded as passed (with a letter grade), failed, dropped, withdrew, audit, credit, no credit, satisfactory, unsatisfactory, or incomplete. In no case is credit allowed in any course for which the student is not properly registered.

**Grade of Incomplete:** The grade of "I" (Incomplete) may be assigned by the faculty member in any course in which the student is unable to complete the work due to extraordinary events beyond the student's control that are acceptable to the faculty member. The "I" may not be used to extend the term for students who complete the course with an unsatisfactory grade. Unless the student completes the requirements for removal of "I" within 45 days from the end of the semester or summer term in which it was received (see University Calendar), the "I" will be changed to "F," whether or not the student is enrolled. The faculty member, with the approval of the department chair, may grant up to a 45-day extension if sufficient extenuating circumstances exist. At the end of the extension period, the "I" will automatically revert to "F" if the student has not completed the requirements. The student will be certified for graduation only when all requirements are met, including the removal of "I" grades. For students who have an "I" in a course required to fulfill degree requirements in the semester in which they expect to graduate, the certification process and graduation will automatically be deferred to the next term.

In Progress: In courses with "In Progress" (IP) grading, faculty members may assign "IP" to extend the time permitted for completion of research or course requirements. A student awarded an "IP" grade must re-enroll in the course for the same number of hours to complete the work. The final grade will be submitted by the faculty member at the end of the term in which the work is completed. This should be the semester following the "IP" grade.

**Grade Changes:** Grades properly issued in a course by the faculty member of record will not be altered except when an error was made in computation or reporting or as a result of a formal grade appeal. A grade other than "I" may not be changed as a result of additional work after a grade has been submitted to the Office of the Registrar. The Grade Appeals procedure is described below.

## **Grade Reports**

Current semester grades may be obtained on Student Self Service. Grades are normally available by the Thursday after the last day of the exam period for the session.

26

## Withholding of Grade Reports

The University is required by State law to withhold grade reports, transcripts, and diplomas from students who have outstanding financial obligations to the University. When financial obligations have been resolved, students may obtain their grades on Student Self Service.

## **Repetition of Courses**

A student may repeat most courses in an attempt to improve the grade previously earned. There are some courses that may not be repeated for this purpose. Information concerning these courses may be obtained from the office of the chair of the department in which the course is offered. In some degree and major programs, there are restrictions on course repetitions even after drops or withdrawals. The student should always check with the major advisor before enrolling in a course a second or subsequent time(s).

The University is not obligated to allow substitutes for repetition of courses which have been deleted from the curriculum. Credit by examination may not be used for the purpose of improving a grade previously earned in a course taken for credit.

Grades earned in the second and each subsequent attempt will count towards the student's GPA. However, only earned hours from the final attempt are counted in the cumulative earned hours.

A student may not attempt the same course more than three times. Exceptions to this policy will be granted only on appeal to the dean of the college in which the course is offered.

The record will continue to reflect grades for all attempts of repeated courses with the appropriate repeat notations.

#### Courses repeated after a degree is awarded may not be used to replace grades earned prior to the awarding of the degree.

The Office of the Registrar's website gives detail information on how GPA and earned hours are computed on courses that have been repeated. This page can be accessed here.

### **Audit Courses**

Students who are admitted to the University of Memphis may register to audit a course with the prior approval of the instructor and the department chair. Students enrolling on an audit basis do not receive academic credit for that course. Particularly in high-demand courses, departments should make sure that students who need these courses for degree credit can be accommodated before they issue permits for audits. Audits should not be used simply as a vehicle for obtaining access to laboratory or studio facilities.

Auditors are not required to take examinations and do not receive a regular letter grade. There should be a precise agreement between the student and the instructor as to the extent and nature of the student participation in the course, including class discussions, projects, and readings. Students auditing a course will receive "AU" (Audit) on the transcript only if they have attended regularly and participated according to the prior agreement with the instructor.

A student may not change from a grade point to an audit or from an audit to a grade point basis after the last day to add classes for that session. Any questions concerning this policy should be referred to the colleges.

Fees for audits will be assessed on the same basis as fees for credit courses.

## **Credit/No-Credit Courses**

The University, wishing to encourage students to broaden their range of interest without jeopardizing their grades, allows students who have earned at least 60 semester hours with a minimum grade point average of 3.0 to enroll in credit/no-credit courses. For this purpose, students may take up to 8 hours of coursework on a credit/no credit basis provided that these courses are unrestricted electives. Specifically excluded are general education, college, major and degree requirements, and requirements for a minor. A student taking a course on a credit/no-credit basis must meet the prerequisites for that course as set forth in this catalog, or have permission of the instructor.

- Neither a credit nor a no-credit grade is counted in a student's grade point average, but, like all other grades, is entered on the permanent record.
- Credit (CR) grade is given for "C-" or better work on the traditional grading scale and no-credit (NC) is given for less than "C-" work.
- The student only receives credit in the course if credit (C- or better) is received.
- A student may not repeat a course for credit/no-credit if the student received a conventional grade (A-F or S).

Students who transfer from one college to another should be aware that credit/no-credit hours may be accepted in one college and not in another. In every instance, approval to register for a course on a credit/no-credit basis must be obtained from the advisor and the dean of the student's degreegranting college prior to registration for that class.

With approval, a student who registers for a course on a credit/no-credit basis may change the registration to a letter grade point basis only during the add period, and a student who registers for a course on a letter grade point basis may change the registration to a credit/no-credit basis only during the add period for the term or session of the course. The student who successfully completes a credit/no-credit course will receive the appropriate number of hours as credit toward graduation. These hours will not be used in the computation of the grade point average.

# **Undergraduate Grade Appeal Procedure**

# **Purpose of the Undergraduate Grade Appeals Procedure**

The responsibility for evaluating student work and assigning grades lies with the instructor of the course. The purpose of the grade appeal procedure is to provide a review process

1) for a student to understand the reasons why the grade was assigned,

2) for the instructor to become aware of and correct possible errors,

3) for appropriate supervisors at the department and college level to review the basis on which a grade has been awarded and to correct cases in which a grade is determined to have been assigned based on arbitrary or capricious action, or other reasons not related to academic performance.

If, after departmental and college review, the grade is still in dispute, an appeal may be submitted to the Office of the Vice President for Student Academic Success who will notify the Undergraduate Grade Appeals Committee, which consists of faculty and student representatives, for final resolution.

In all cases of a disputed grade, the student has burden of proof that the grade assigned was not appropriate. If the case has not been resolved at the student/instructor level, then the student should submit a written petition that would include a copy of the syllabus along with copies of any tests, quizzes, assignments or other written work completed and graded as part of the class requirements to the appropriate step of review. At each step of further review, copies of any previously submitted materials and any written responses to those petitions should be included.

It is important to distinguish grounds for grade appeal from questions about quality of instruction. Successful grade appeals should be based on evidence that the student performed at a level sufficient to warrant a different grade. It is important for students to bring to the instructor's and the department's attention perceived deficiencies in instruction, but these by themselves do not normally warrant a change in grade. For a successful grade appeal, the student should be able to show, for example, not that the student could have earned a grade of "B" under different circumstances, but rather that the student actually did earn a grade of "B" according the standards set out on the syllabus for that course, but was assigned a lower grade. If, in the opinion of the department or the college, deficiencies in instruction are so grave as to warrant an alternative accommodation, then the proper remedy will normally involve alternative assignments or examinations to allow the student the opportunity to demonstrate the appropriate level of competency in that area to earn a different grade than the grade originally assigned. The decision about these cases should be made at the departmental or college level. In disputed cases where the appeal is based primarily upon perceived quality of instruction, the Undergraduate Grade Appeals Committee has the option of referring the case directly to the Office of the Vice President for Student Academic Success.

# Procedures

A student wishing to appeal a grade must follow Steps 1-4 listed below. (The deadlines listed below apply to the dates when classes are in session during the fall or spring semesters.) If a student fails to observe the deadlines, the decision made in the previous step will be final. If a department or college fails to respond to the student's complaint within the deadline, the student should contact the Office of the Vice President for Student Academic Success. The deadline for filing the appeal should be extended appropriately to ensure that the student retains the opportunity to pursue the appeal at the next step. All correspondence and records will be retained in the office in which the complaint is resolved.

**Step 1:** The student should first consult with the instructor, at the latest within two weeks of the beginning of the subsequent fall or spring semester, in an effort to provide a satisfactory resolution of the complaint. The only exception to this step is the case in which the instructor is unresponsive or unavailable. In this case, the student may proceed directly to Step 2.

28

**Step 2:** If the complaint is not resolved in Step 1, the student may present the complaint in writing by the end of the third week in the semester to the chair of the department in which the course was offered. Included in the petition the student should attach the appropriate materials described above, and if available, the instructor's written explanation for the assigned grade. The department chair will attempt to resolve the complaint in consultation with the instructor and the student. The department chair will provide a written response to the student within two weeks from the time the written complaint has been received. If the department chair was the instructor of the course, the student may proceed directly to Step 3.

**Step 3:** If the complaint has not been resolved at the departmental level, the student may appeal further by presenting a written petition to the dean of the college in which the course was offered, along with a copy of the materials presented at the previous stage and any written responses received from the department. At the latest, this petition should be presented within one week after the departmental response. Within two weeks of the time the complaint was received, the dean may use any resources available to resolve the conflict.

If the dean finds that the request does not have merit, the dean shall notify the student in writing, with copies sent to the instructor and the department chair. If the dean and the department chair agree that the grade should be changed, the dean shall be empowered to change the grade without the instructor's consent. Either the student or the instructor may appeal this decision in Step 4. If the dean and the department chair do not agree, the dean shall present his or her view in writing to the student, with copies to the instructor and the department chair, so that the student may include that information in an appeal to the Undergraduate Grade Appeals Committee for final resolution of the complaint.

**Step 4:** If the complaint has not been resolved through the previous steps, the student may present a grade appeal petition addressed directly to the Undergraduate Grade Appeals Committee through the Office of the Vice President for Student Academic Success. Copies of written materials and petitions presented at the previous steps, along with any written responses received from the department or the college, must be included with the petition at the time of submission. The deadline for submission of a petition is March 15 for grades awarded during the previous fall term, and October 15 for grades awarded during the previous spring or summer terms. (The Grade Appeals Committee does not meet during summer months.) The Office of the Vice President for Student Academic Success will forward the petition along with the attached materials to the chair of the Undergraduate Grade Appeals Committee, who will distribute copies to the members of the Committee.

The Committee members shall review the petition and the attached materials and then forward their recommendation to the chair of the Committee about whether a hearing is warranted in this case. If a majority of the Committee does not vote that the case merits a hearing, the grade stands as issued. If a majority of the Committee votes in favor of a hearing, the chair of the Committee shall inform the student and the instructor, and shall arrange a hearing to be attended by the student, the instructor, and the members of the Undergraduate Grade Appeals Committee or their designated alternates. The hearing may be attended remotely through the use of technology. Copies of the Committee's decision for the hearing shall be sent to the department chair and dean of the college.

Prior to the hearing, the instructor should be given a copy of the student's petition and supporting materials. If members of the Committee feel that additional factual information is needed prior to or after the hearing to render a decision, the chair of the Committee should inform the Office of the Vice President for Student Academic Success, of that request in writing, and that office should make every effort to provide that information in writing to the Committee. At the hearing, first the student and then the instructor will each have the opportunity to present their cases orally and to present any other written materials they deem appropriate. The Committee members shall have the opportunity to ask questions to both the student and instructor. At the end of the meeting, the student and then the instructor shall be given the opportunity for brief closing statements.

The chair of the Committee should inform the student, the instructor, the department chair, the college, and the Office of the Vice President for Student Academic Success of the Committee's decision in writing within one week of the hearing. If a majority of the Committee agrees that the grade should be changed, the Office of the Vice President for Student Academic Success will notify Student Records (Registrar's Office) of the grade change. Otherwise the grade shall remain as recorded. The decision of the Undergraduate Grade Appeals Committee shall be final.

The Undergraduate Grade Appeals Committee shall become a standing committee with members serving a one-year term. Composition of the five committee members is:

A chair designated by the Vice President for Student Academic Success, two faculty members and two alternates designated by the Faculty Senate and two students selected by the Student Government Association.

Although the primary responsibility of the Committee is to review grade appeals and assign the appropriate grade in cases where the appeal is upheld, the Committee shall also report any findings of discrimination or prejudice to the Office of the Vice President for Student Academic Success for further consideration and possible action.

# **Posthumous Degrees**

In the unfortunate event of a student's death during an academic term in which it may reasonably be assumed that he or she would have completed all degree requirements, a degree may be awarded posthumously to the student. The decision as to the likelihood that the student would have completed his or her work during the term shall be at the discretion of the president. The special nature of the award should be reflected on all pertinent records.

# **Computing GPA**

Computation of a student's college-level undergraduate grade point average (excluding developmental) includes all courses attempted except credit/no-credit, audit, incomplete, developmental, and satisfactory/unsatisfactory courses and "T"\* grades. As an example: a student carrying five three-semester-hour courses for a total of 15 semester hours makes the following grades: A, B, C, T, F, thus accumulating grade points in the amount of 12, 9,6,0, 0, for a total of 27. To compute the grade point average, divide the number of quality hours (except "T" grade) (12) into the grade points earned (27) for an average of 2.25.

The Office of the Registrar's website gives detailed information on how GPA and earned hours are computed on courses that have been repeated. This page can be accessed here.\*T grades may show on the transcript during the Summer 2015 through Summer 2019 time period, indicating a course transferred in but the grade is not reflected in the Overall GPA. During this period transfer work posted is reflected in earned hours but does not apply to the Overall GPA or Overall Combined GPA in compliance with the Tennessee Board of Regents transfer policy and academic catalogs at that time.

As of Fall 2019, transfer work posted will be reflected in earned hours and applied to the Overall GPA and Overall Combined GPA. (Overall GPA is used to determine undergraduate graduation and athletic eligibility. Overall Combined GPA is used to determine academic standing, financial aid, and scholarship eligibility, except for HOPE.)

Any transfer work posted before Summer 2015 is reflected in earned hours and applied to the Overall GPA and Overall Combined GPA.

# **Academic Fresh Start**

## What Is An Academic Fresh Start?

A plan of academic forgiveness which allows undergraduate students who previously experienced academic difficulty to improve their academic record upon returning to college after an extended absence. Allows eligible students to resume study without being penalized for past unsatisfactory scholarship and signals the initiation of a new GPA.

# **Student Requirements:**

- 1. Have been separated from all accredited collegiate institutions for a minimum of four (4) consecutive calendar years preceding the first term of enrollment as a transfer student or re-enrollment at the University of Memphis.
- 2. Be admitted as a degree seeking student at the University of Memphis.
- 3. Must have below a 2.5 (cumulative) GPA at the time of application.
- 4. Has not earned an undergraduate degree (Associate or Bachelor's degree).
- 5. Submit an Academic Fresh Start application to the Registrar's Office within one (1) calendar year from the term of enrollment or reenrollment at the University of Memphis.

# **Terms of Academic Fresh Start:**

- 1. The student can only be granted an Academic Fresh Start once during their undergraduate career.
- 2. Academic Fresh Start allows previously failed courses to be excluded from the calculations of the new GPA.
- 3. Courses with a "D" grade will also be excluded from the calculation when a grade of "C" or better is required in the student's current major.
- 4. The new GPA and credit hours will reflect courses for which passing grades were earned and retained from the pre-Academic Fresh Start performance.
- 5. Academic Fresh Start requires approval by the appropriate college dean and designee.
- 6. Academic Fresh Start will be formally applied after the census enrollment date at the University of Memphis.
- 7. The student's University of Memphis transcript will note that an Academic Fresh Start was granted and the effective date.
- 8. For further information regarding Academic Fresh Start you may contact the Registrar's Office at 901.678.2389 or via e-mail at scraft@memphis.edu.

# **Academic Renewal**

Academic Renewal is a plan of academic forgiveness that allows undergraduate students with previous academic difficulty to improve their academic record when they change programs of study (majors). Academic Renewal allows students to exclude a limited number of undergraduate courses in which they received a D or F at the University of Memphis from their GPA calculation. It is intended to forgive grades of D or F in courses that do not apply to the new major.

## **Student Requirements:**

### To be considered eligible for Academic Renewal, a student must:

- 1. Be admitted as a degree-seeking student at the University of Memphis.
- 2. Have an institutional (University of Memphis) and/or overall GPA of less than 2.0 at the time of application for Academic Renewal.
- 3. Have their advisor/college submit an Academic Curriculum Change form indicating the change to a new program of study (major).
- 4. Not have earned an undergraduate Bachelor's degree previously or have been granted a previous Academic Renewal or Academic Fresh Start.
- 5. Complete an Academic Renewal Form in consultation with their new major advisor and signed by both the student and the new advisor. The student may apply to exclude a maximum of five courses with grades of D or F from their GPA calculation (an "X" will appear in front of the grade on the transcript). These courses must be required courses in the previous program of study (old major) and cannot be required for the new program of study (major). The application should be submitted to the Registrar's Office, located in 003 Wilder Tower, for review. Registrar's staff will keep advisors from both programs informed of the status of the application and consult with them if needed.

### If the application is approved by the Registrar's Office, to be granted Academic Renewal, a student must:

- 1. Complete a minimum of 12 hours with a minimum GPA of 2.25 in courses that represent progress toward the new declared major. These 12 hours must be completed within one academic year of the application, and in consecutive semesters.
- 2. Consult with the Center for Academic Retention and Enrichment services (CARES), if appropriate.

### **Terms of Academic Renewal:**

- 1. Academic Renewal is not a substitute for repeating courses to replace grades and should only be used as a final option. The student may be granted Academic Renewal only once during an undergraduate career.
- 2. Once a student has successfully fulfilled conditions for Academic Renewal, the GPA will then be re-calculated excluding the courses named in the application. Reminder: maximum of five courses with a grades of D or F may be excluded; the courses may come from any semester or combination of semesters; most importantly, all courses excluded must be required courses in the previous program of study (old major), and cannot be required for the new program of study (major). These courses will appear with an "X" in front of the grade on the transcript. **Courses in which the grade was a result of academic misconduct are not eligible for academic renewal.**
- 3. Courses chosen under this policy would not count toward the number of times that a course could be repeated, nor would it affect the grade replacement limit.
- 4. Academic renewal is independent of financial aid and scholarship regulations and requirements. The student should consult with the Office of Financial Aid, University & Student Business Services, Scholarship Office, and/or Veterans Educational Benefits & Certification in the Office of Registrar at the University of Memphis for proper guidance regarding federal, state, and institutional financial aid programs; collection of student fees and charges; payment plan options; scholarship eligibility; and/or educational benefits.
- 5. Students using this policy should understand that because the original grades remain on the transcript, they may be considered by other institutions when applying to graduate or professional school and by employers.

# **Center for Academic Retention and Enrichment Services** (CARES)

The academic progress of students at the University of Memphis is monitored at the conclusion of each term enrolled to determine their academic status. Students' overall combined grade point average *AND* term grade point average are considered in determining status. There are four progressive levels of academic status:

- 1. Good Standing
- 2. Academic Warning

- 3. Academic Probation
- 4. Academic Suspension

## **Good Standing**

Students are in Good Standing at the University of Memphis unless placed on Academic Warning, Academic Probation or Academic Suspension.

If a student has never been on Academic Warning, Academic Probation or Academic Suspension	⇒ The student remains in Good Standing as long as the overall combined GPA is 2.00 or above <i>AND</i> the term GPA is not lower than 1.00.
If a student has been on Academic Warning, Academic Probation or Academic Suspension	⇒ The student is expected to maintain a minimum overall combined GPA of 2.00 <i>AND</i> a minimum term GPA of 2.00 in order to remain in good standing.

## **Academic Warning**

Students can be placed on Academic Warning ONLY ONCE during their enrollment at the University of Memphis. After completing seven (7) hours of coursework, students will be placed on Academic Warning when their overall combined GPA is below 2.00 OR the term GPA is below 1.00. Once students receive an Academic Warning, they must maintain Good Standing or they will be placed on Academic Probation or Academic Suspension.

Students who have earned 0-29 semester hours and are placed on Academic Warning must:

- 1. Successfully complete a workshop and pass the related quiz;
- 2. Meet with an Academic Coach every other week in the following semester of enrollment; and
- 3. Submit a Conditional Enrollment Agreement with the Center for Academic Retention and Enrichment Services (CARES), and satisfy the requirements in the Agreement.

Students who have earned 30 or more semester hours and are placed on Academic Warning must:

- 1. Successfully complete an online workshop and pass the related quiz: and
- 2. Submit a Conditional Enrollment Agreement with the Center for Academic Retention and Enrichment Services, and satisfy the requirements in the agreement.

The Academic Warning workshop is available online at https://www.memphis.edu/cares/academicwarning.php. Failure to satisfy these requirements may lead to administrative withdrawal from all classes for any future terms.

### **Academic Probation**

Any student who has ever been placed on Academic Warning status will be placed on Academic Probation if:

- Their overall combined GPA is below 2.00, OR
- The term GPA is below 2.00.

<u>NOTE</u>: Students who have regained Good Standing after an Academic Warning are placed on Academic Probation, if, in any subsequent term, their combined GPA falls below a 2.00 OR the term GPA below 2.00.

- 1. First Academic Probation: All students placed on Academic Probation for the first time will be required to enroll in and complete ACAD 2200: Student Success Seminar (1 semester hour) in the following semester of enrollment.
- 2. Subsequent/Continuing Probation: Students will remain on Academic Probation if the term GPA is 2.00 or higher but the overall combined GPA remains below 2.00. Students who are placed on Academic Probation more than one time must complete a Conditional Enrollment Agreement with the Center for Academic Retention and Enrichment Services (CARES) and meet weekly with a CARES counselor.

Students on Academic Probation will be required to have an overall combined GPA of at least 2.00 OR a term GPA of at least 2.00 in order to continue enrollment at the University of Memphis. Failure to satisfy these requirements may lead to administrative withdrawal from all classes for any future terms.

## **Academic Suspension**

Students on Academic Probation will placed on Academic Suspension in the following term if the overall combined GPA is below 2.00 AND the term GPA is below 2.00.

32

Students on Academic Suspension can apply for readmission only after the following minimum periods:

- 1. For the first Academic Suspension, one regular term (fall or spring)
- 2. For the second Academic Suspension, one calendar year

After a second Academic Suspension, a student may be ineligible for further enrollment at the University of Memphis.

Students on Academic Suspension who apply for readmission must participate in a readmission interview with a Center for Academic Retention and Enrichment Services (CARES) Counselor.

Coursework taken at another accredited college or university will be used in determining eligibility for readmission. Students who left the university on Academic Suspension must fulfill all previously attempted high school deficiencies and remedial and developmental coursework requirements before they will be considered for readmission.

Students readmitted after Academic Suspension must complete a Conditional Enrollment Agreement, meet weekly with a CARES counselor, and follow all requirements established by CARES.

Failure to follow these requirements may lead to administrative withdrawal from all classes.

The Center for Academic Retention and Enrichment Services (CARES), 500 Wilder Tower, is responsible for the administration of this policy.

# **Recognition of Academic Performance**

The University of Memphis recognizes outstanding academic performance in a variety of ways. In addition to those listed below, there are other honors and awards listed in the descriptions of the various honors programs.

### The Dean's List

The Dean's List is composed of those students who have 12 or more earned hours in the fall or spring semesters with a minimum grade point average of 3.5 for that semester.

## **Graduation With Distinction**

Students who intend to achieve Graduation with Distinction must do the following:

- 1. Fulfill all University of Memphis graduation requirements.
- 2. Earn the following minimum grade point average on **both** their UofM and Overall\* GPA to achieve the listed designations:
- 3.2500-3.4999 Cum Laude
- 3.5000-3.7999 Magna Cum Laude
- 3.8000-4.0000 Summa Cum Laude

\*Overall GPA refers to the combination of the student's UofM GPA and the GPA from college level transfer courses that were posted prior to Spring 2015 and after Summer 2019. Transfer work posted during Summer 2015 through Summer 2019 is not counted in the Overall GPA per the Tennessee Board of Regents transfer policy and the academic catalogs for this time period.

The actual conferral of Graduation with Distinction cannot be made until the student's UofM and Overall GPA has been certified by the College/School. Transitional Academic Studies courses (DSP) are not considered in calculating eligibility for Graduation with Distinction. College level courses used to satisfy high school deficiencies will be considered in the computations to determine eligibility for Graduation with Distinction.

# **Privacy Rights of Parents and Students**

The Family Educational Rights and Privacy Act of 1974, with which the University complies fully, is designed to protect the privacy of educational records, to establish the right of students to inspect and review their educational records, and to provide guidelines for the correction of inaccurate or

misleading data through informal and formal hearings. Students also have the right to file complaints with The Family Educational Rights and Privacy Act Office (FERPA) concerning alleged failures by the institution to comply with the Act.

The provisions for the release of information about students and the rights of students and others to have access to the University of Memphis education records are published in their entirety in the University of Memphis Procedure "Privacy of Education Records" which is available in the offices of the Registrar and the University Counsel. A printable FERPA guide can be found by clicking on the following: FERPA Guide

# **University of Memphis Academic Calendar**

### Academic Year 2020-2021

The Academic Year begins with the start of the Fall semester and concludes with the end of the Summer semester of the succeeding calendar year. Used chiefly for event planning and scheduling, these calendars contain dates for these major term/part-of-term events: first/last day of classes, breaks/holidays, and Study Day/exams.

**Note:** The calendar is subject to change at any time prior to or during an academic term due to emergencies or causes beyond the reasonable control of the institution, including severe weather, loss of utility services, or orders by federal or state agencies.

### **Definitions:**

**Study Week Definition:** The four day period preceding final examinations. No student social or athletic functions shall be scheduled during Study Week.

**Study Day Definition:** The day prior to final examinations during most regular semesters. No academic activities shall be scheduled on Study Day. No study or review sessions which the student may feel obligated to attend may be scheduled.

**Final Examination Period:** No examination shall be given at a time other than the scheduled time except with written permission from the department chair and the college dean. No social or athletic functions shall be scheduled during the final Examination Period.

Intercollegiate athletics have exceptions from the above policies

### What is a Part of Term?

### Fall 2020

### All Parts of Term

- Registration Period Begins: April 6, 2020 / Monday
- Commencement: Check Commencement website

### Full Part of Term

- First Day of Classes: August 24, 2020 / Monday
- Labor Day: September 7, 2020 / Monday
- Fall Break: October 10-13, 2020 / Saturday Tuesday
- Thanksgiving Holidays: November 25-29, 2020 / Wednesday Sunday
- Last Day of Classes: December 2, 2020 / Wednesday
- Study Day: December 3, 2020 / Thursday
- Exams: December 4-10, 2020 / Friday Thursday

1st Half Part of Term

- First Day of Classes: August 24, 2020 / Monday
- Last Day of Classes/Exams: October 9, 2020 / Friday
- 2nd Half Part of Term
  - First Day of Classes: October 14, 2020 / Wednesday
  - Last Day of Classes/Exams: December 2, 2020 / Wednesday

### Spring 2021

### All Parts of Term

- Registration Period Begins: November 9, 2020 / Monday
- Commencement: Check Commencement website.

Full Part of Term

- M. L. King, Jr. Holiday: January 18, 2021 / Monday
- First Day of Classes: January 19, 2021 / Tuesday
- Spring Break: March 8-14, 2021 / Monday-Sunday
- Last Day of Classes: April 28, 2021 / Wednesday
- Study Day: April 29, 2021 / Thursday
- Exams: April 30 May 6, 2021 / Friday-Thursday

1st Half Part of Term

- First Day of Classes: January 19, 2021 / Tuesday
- Last Day of Classes/Exams: March 5, 2021 / Friday

2nd Half Part of Term

- First Day of Classes: March 15, 2021 / Monday
- Last Day of Classes/Exams: April 28, 2021 / Wednesday

### Summer 2021

To be completed.

Contact Us:Office of the Registrar003 Wilder TowerMemphis, Tennessee 38152-3520901.678.3928 (Phone) 901.678.5757 (Fax)

# **Undergraduate Programs**

The following section contains the specific requirements for completing each degree, major, concentration, minor and fully online majors offered by the University. It is organized by college and department. Students are urged to consult with an advisor for assistance in planning their degree programs and selecting appropriate courses.

### Accounting, (B.B.A.)

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

Accounting majors must earn a minimum grade of B- in ACCT 2010 and ACCT 2020.

### College and Degree (B.B.A.) Requirements

### Lower Division Business Core Curriculum (21 hours)

No grade below "C" and 2.5 GPA in the following Lower Division Business Core

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3) Accounting Major Must Earn a Minimum Grade of B-
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3) Accounting Major Must Earn a Minimum Grade of B-
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

### Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)

Choose one of the following international business electives:

- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

24 upper division semester hours in Accounting courses as follows:

- ACCT 3000 Career Development for ACCT Credit Hours: (3)
- ACCT 3110 Intermediate Accounting I \*\* Credit Hours: (3)
- ACCT 3120 Intermediate Accounting II \*\* Credit Hours: (3)
- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)
- ACCT 3510 Federal Income Tax I \*\* Credit Hours: (3)
- ACCT 4020 Accounting Info Technology \*\* Credit Hours: (3)
- ACCT 4240 Audit/Assurance Services \*\* Credit Hours: (3)
- ACCT 4310 Data Analytics for Accountants Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Typical 4-Year Accounting Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) or
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

• ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Elective (3)

#### Semester Totals 32 hrs

Junior Year

- ACCT 3000 Career Development for ACCT Credit Hours: (3)
- ACCT 3110 Intermediate Accounting I \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- ACCT 3120 Intermediate Accounting II \*\* Credit Hours: (3)
- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

Elective (3)

- ACCT 4020 Accounting Info Technology \*\* Credit Hours: (3)
- ACCT 3510 Federal Income Tax I \*\* Credit Hours: (3) International Business elective (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- ACCT 4240 Audit/Assurance Services \*\* Credit Hours: (3)
- Elective (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- ACCT 4310 Data Analytics for Accountants Credit Hours: (3)

#### Semester Totals 30 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Advertising (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# Journalism and Strategic Media Core (18 hours)

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)

## **Core Elective**

Select one of the following (3 hours):

- JRSM 4702 Media, Diversity & Society \*\* Credit Hours: (3)
- JRSM 4704 Issues in Sport and Media Credit Hours: (3)
- JRSM 4708 Media Ethics Credit Hours: (3)
- JRSM 4716 Media History Credit Hours: (3)
- JRSM 4720 Presidents and the Press Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours):

- JRSM 4930 Media Internship \*\* Credit Hours: (3)
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)

## Advertising (30 hours Journalism and Strategic Media and 9 Marketing hours):

### Major Core (21 hours)

- ADVR 3300 Intro to Advertising \*\* Credit Hours: (3)
- ADVR 3310 Branding and Strategic Media Credit Hours: (3)
- ADVR 3324 Creative Strategy Credit Hours: (3)
- ADVR 4326 Advertising Research Credit Hours: (3)
- ADVR 4327 Media Planning Credit Hours: (3)
- ADVR 4328 Strategic Adv Campaigns Credit Hours: (3)
- ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3)

## Advertising electives (9 hours)

- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- ADVR 3320 Strategic Account Management Credit Hours: (3)
- ADVR 3330 Analytics & Evaluation Credit Hours: (3) Or
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- CRMM 4900 Creative Media Lab Credit Hours: (3)

### Marketing (9 hours)

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)

## Electives

Completion of courses to bring the total to 120 semester hours.

## Typical 4-Year Advertising Sequence

## Freshman Year

- JRSM 1700 Intro to Media \*\* Credit Hours: (3) \*\*
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences (3) \*
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Fine Arts (3) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

### Sophomore Year

- ADVR 3300 Intro to Advertising \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Foreign Language/B.A. (3)
- History (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ADVR 3310 Branding and Strategic Media Credit Hours: (3)
- Humanities/Fine Arts (3)\*
- Natural Science (4) \*
- Foreign Language/B.A. (3)

• MATH (3) \*

### Semester Totals 31 hrs

### Junior Year

- ADVR 3324 Creative Strategy Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Non-JRSM Elective (Minor) (3)
- CRMM 4900 Creative Media Lab Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM elective (Minor) (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

### Semester Totals 31 hrs

## Senior Year

- ADVR 4326 Advertising Research Credit Hours: (3)
- ADVR 4327 Media Planning Credit Hours: (3)
- Non-JOUR Elective (Minor) (3)
- Non-JOUR Elective (Minor) (1)
- JRSM 4700 Media Law \*\* Credit Hours: (3)
- ADVR 4328 Strategic Adv Campaigns Credit Hours: (3)
- JRSM 4930 Media Internship \*\* Credit Hours: (3) or
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)
- UD JRSM Elective (3)
- ADVR/JOUR/JRSM/PBRL elective (3)
- Non-JRSM Elective (Minor) (3)

### Semester Totals 28 hrs

# Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# African and African American Studies, (B.A.)

Program objectives for a B.A. in African and African American Studies are to: (a). define the term "diaspora" and describe the history, scope and impact of the post-Renaissance diaspora of African peoples; (b) critique the experiences of African and African American women within the context

of the collective experiences of Africans and African Americans and the world as a whole; (c) apply methodological approaches and analytical skills used in the humanities, the social and behavioral sciences, or the arts to the study of the experiences of Africans and people of African descent in the Diaspora; (d) demonstrate an understanding of the links between African cultural institutions and those of people of African descent in the Diaspora; (e) compare and contrast the history and cultures of peoples of Africa to the history and cultures of peoples of African descent in the Diaspora.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (30 hours)

## Major Core (18 hours):

### Completion of

- AAAS 2100 Intro Afr/Afr American Study \*\* Credit Hours: (3)
- AAAS 3100 Research Method/Afr American \*\* Credit Hours: (3)

### Or One of the Following:

- ANTH 4010 Ethnographic Methods Credit Hours: (3)
- CJUS 3130 Research Methods CJUS \*\* Credit Hours: (3)
- COMM 3330 Communication Research Methods \*\* Credit Hours: (4)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

### Completion of

• AAAS 4100 - Seminar Afr/Afr Amer Studies \*\* Credit Hours: (3) and one course selected from each concentration (9 hours).

## Concentration (12 hours):

#### Humanities:

- AAAS 4351 Ghanaian Hist/Culture Credit Hours: (3)
- ENGL 3325 Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3)
- ENGL 3326 Af/Am Lit since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4372 Af/Am Author/Harlem Ren \*\* Credit Hours: (3)
- ENGL 4373 Af/Am Author since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4374 Af/Am Lit Movements \*\* Credit Hours: (3)
- ENGL 4521 Language and Society \*\* Credit Hours: (3)
- HIST 3273 Islamic History to 1405 Credit Hours: (3)
- HIST 3281 History/Africa to 1500 Credit Hours: (3)
- HIST 3282 History of Africa since 1500 Credit Hours: (3)
- HIST 3670 Civil War/Reconstruction\*\* Credit Hours: (3)
- HIST 3840 U S Constitutional History Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4022 Oral History Credit Hours: (3)

- HIST 4050-4069 Special Topics in History Credit Hours: (1-3)
- HIST 4222 Race/Class in Latin America Credit Hours: (3)
- HIST 4283 History/South Africa Credit Hours: (3)
- HIST 4288 West Africa/Diaspora \*\* Credit Hours: (3)
- HIST 4289 African Women's History Credit Hours: (3)
- HIST 4853 African American Women Credit Hours: (3)
- HIST 4871 U S Urban History Credit Hours: (3)
- HIST 4879 Africa to the Americas Credit Hours: (3)
- HIST 4880 Slavery/Freedom/Segregation Credit Hours: (3)
- HIST 4882 Civil Rights Movement Credit Hours: (3)
- PHIL 3452 Feminist Theory Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)

#### Social and Behavioral Sciences:

- AAAS 4251 African Religions/Diaspora Credit Hours: (3)
- ANTH 3242 Peoples of Africa Credit Hours: (3)
- ANTH 3282 American Communities \*\* Credit Hours: (3)
- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4051
- ANTH 4411 Urban Anthropology Credit Hours: (3)
- ANTH 4412 Neighborhood Development Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- ANTH 4660 Museum Collections Credit Hours: (3)
- ANTH 4661 Collections Research Credit Hours: (3)
- ANTH 4662 Museum Exhibitions Credit Hours: (3)
- CJUS 3510 Law and Society Credit Hours: (3)
- CJUS 4460 Race, Ethnicity and Justice in America Credit Hours: (3)
- ESCI 4431 Urban Geography Credit Hours: (3)
- ECON 4740 Health Care Economics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 3420 Race and Politics in U.S. Credit Hours: (3)
- POLS 4101 Political Statistics \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4317 Democratic Transitions Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)
- SOCI 3112 Contemporary Social Problems \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3420 Sociology of the South Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4460 Black/White Women in South Credit Hours: (3)
- SOCI 4631 Cities in Change Credit Hours: (3)

- AAAS 4451 Rhetoric of Hip Hop \*\* Credit Hours: (3)
- ARTH 4112 Egypt Art-Old Kingdom Credit Hours: (3)
- ARTH 4113 Egypt Art-New Kingdom Credit Hours: (3)
- ARTH 4181 Arts Africa/Oceania/N America Credit Hours: (3)
- ARTH 4183 Visual Arts of Africa Credit Hours: (3)
- ARTH 4185 African American Art Credit Hours: (3)
- ARTH 4660 Museum Collections Credit Hours: (3)
- ARTH 4662 Museum Exhibitions Credit Hours: (3)
- COMM 3360 Rhetoric of Pop Culture Credit Hours: (3)
- COMM 3361 African-American Rhetoric \*\* Credit Hours: (3)
- COMM 4341 Interpersonal Communication \*\* Credit Hours: (3)
- COMM 4364 Gendered Public Discourse Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4804 Blues Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)
- THEA 4545 Thea/African Diaspora Credit Hours: (3)

# Electives (40-43 hours)

Electives may be chosen to bring the total number of hours to 120.

# Typical 4-Year African and African American Studies Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- Elective (3)
- Foreign Language/B.A. (3)
- AAAS 2100 Intro Afr/Afr American Study \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Elective (3)
- Foreign Language/B.A. (3)
- Humanities (3) \*

### Semester Totals 30-31 hrs

## Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

- Social/Behavioral Sci. (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- Elective (3)
- History (3) \*
- Elective (3)
- Fine Arts (3) \*
- Natural Science (4) \*
- AAAS Arts Core (3)

#### Semester Totals 32 hrs

#### Junior Year

- AAAS Humanities Core Elective (3)
- Social/Behavioral Sciences (3) \*
- History (3) \*
- AAAS 3100 Research Method/Afr American \*\* Credit Hours: (3)
- AAAS conc. elective (3)
- AAAS Soc/Behav core elective (3)
- AAAS conc. elective (3)
- UD elective (3)
- UD elective (3)
- Elective (3)

## Semester Totals 30 hrs

## Senior Year

- UD elective (3)
- AAAS conc. elective (3)
- UD elective (3)
- Elective (3)
- Elective (3)
- AAAS 4100 Seminar Afr/Afr Amer Studies \*\* Credit Hours: (3)
- UD elective (3)
- AAAS conc. elective (3)
- Elective (4)

#### Semester Totals 28 hrs

Total Hours: 120-122

## Total Hours Required for Graduation: 120-121

\*Must satisfy University General Education Program Requirement

# Anthropology, (B.A.)

Program objectives for a B.A. in anthropology are that students will: (a) demonstrate knowledge of the holistic foundations of anthropology, and core subfields of cultural anthropology, biological anthropology, archaeology, and linguistics; (b) demonstrate critical analysis and independent thought in relation to core constructs, theories, and methods in anthropological works; (c) demonstrate effective written communication skills; and (d) experience and appreciate anthropology's real world applications through enriched learning opportunities such as community-based research, service learning, internships, and study-abroad programs.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (30 hours)

Completion of 30 semester hours in anthropology courses including

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ANTH 4065 Anthropological Theory Credit Hours: (3)
- and 18 additional semester hours with at least 15 hours at the upper division level.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Honors Program in Anthropology is open to anthropology majors only and requires (a) an inclusive grade point average of at least 3.00, (b) a cumulative grade point average of at least 3.25 in the major, (c) the completion of ANTH 4010 Ethnographic Methods ; (d) four honors courses in anthropology; (e) the completion of independent research (traditional or engaged scholarship) culminating in an original research thesis or creative work. Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred, "With Honors in Anthropology." Moreover, the student's diploma and the record at the University of Memphis will reflect this accomplishment. Admission to the Honors Program in Anthropology requires the completion of an application in which students must identify their specific research interests. See departmental advisor for more details.

# Typical 4-Year Anthropology Sequence

## Freshman Year

#### **First Semester**

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\*
- Foreign Language/BA
- Elective

### Second Semester

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Foreign Language/BA
- Humanities/Fine Arts\* Freshman Year Totals: 30-31 hrs.

#### Sophomore Year

#### **First Semester**

- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science\* (4)
- History\*
- Elective (3)

#### Second Semester

- History\*
- Elective
- Fine Arts\*
- Natural Science\*
- UD Elective

Sophomore Year Totals: 32 hrs.

#### Junior Year

#### **First Semester**

- UD ANTH (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Elective (3)
- UD Elective (3)
- UD ANTH (3)

#### Second Semester

- ANTH 4065 Anthropological Theory Credit Hours: (3)
- UD ANTH (3)
- UD Elective (3)
- Elective (3)
- Elective (3)
  - Junior Year Totals: 30 hrs.

## Senior Year

#### **First Semester**

- UD ANTH (3)
- UD Elective (3)
- Elective (3)
- Elective (3)
- UD Elective

#### Second Semester

- UD ANTH (3)
- ANTH Elective (3)
- UD elective (3)
- Elective (4)

Senior Year Totals: 28 hrs.

# Total Cumulative Hours Undergraduate: 120-121

# Architecture, (B.F.A.)

The Bachelor of Fine Arts with a major in Architecture is a pre-professional degree. At the University of Memphis, the professional degree in Architecture is the Master of Architecture degree which is accredited by the National Architectural Accrediting Board (NAAB). See the Graduate Catalog for details.

**NOTE:** All applicants seeking admission to the B.F.A. with a major in Architecture must complete and submit to the Department of Architecture an application form, a writing assignment, and a portfolio of five representative works. These three components comprise the Entrance Evaluation for Architecture and will be reviewed by a faculty committee. Applicants are accepted on the basis of potential in the field of architecture. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any Architecture courses for which a permit is required beyond first semester, first year is based upon this review. Contact the Department of Architecture for details and deadline.

Students transferring from another major or another institution who intend to pursue a B.F.A. degree with a major in Architecture must complete the Department of Architecture Entrance Evaluation. Transfer students seeking advanced standing in the Architecture major should submit a portfolio of work representing previously completed Architecture studio work. The review committee will determine if the portfolio work is equivalent to comparable courses at the University of Memphis. Placement in the major is dependent upon the review. Even if admitted to advanced standing, the student may be required to remedy previous course deficiencies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following are specified by the department for this program:

## Mathematics:

• MATH 1730 - Pre-Calculus\*\* Credit Hours: (4) or MATH 1830 - Elementary Calculus\*\*

## Social/Behavioral Sciences:

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3) and
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

## Natural Science:

• PHYS 2010 - General Physics | Credit Hours: (3)

and

- PHYS 2011 General Physics Lab I Credit Hours: (1) and
- ESCI 1010 Weather and Climate Credit Hours: (4) or
- ESCI 1020 Landforms \*\* Credit Hours: (4) or
- ESCI 1040 Physical Geology Credit Hours: (4) plus labs Note: All of these Natural Science courses require a lab component.

## Humanities:

- ARTH 2010 World Art | Credit Hours: (3) and
- ARTH 2020 World Art II Credit Hours: (3)

### History:

- HIST 1110 World History to 1500\*\* Credit Hours: (3) and
- HIST 1120 World History since 1500\*\* Credit Hours: (3)

# The Major (87 hours)

## Major Foundation Core (32 hours)

- ARCH 1111 Fundamentals of Design Studio Credit Hours: (3)
- ARCH 1112 Architecture Graphics Studio Credit Hours: (3)
- ARCH 1113 Design Visualization Credit Hours: (3)
- ARCH 1120 Intro to Architecture + Design Credit Hours: (3)
- ARCH 1211 History of Architecture 1 Credit Hours: (3)
- ARCH 2212 History of Architecture 2 Credit Hours: (3)
- ARCH 2411 Building Technology 1 Credit Hours: (3)
- ARCH 2412 Building Technology 2 Credit Hours: (3)
- ARCH 2611 Computer Apps in Design 1 Credit Hours: (3)
- ARCH 2711 Design Studio 1 Credit Hours: (5)

## The Major

## Entrance - Completion of Major Core (32 hours)

Candidacy Review and Portfolio Requirements - A Candidacy Review Portfolio is required of all students intending to major in Architecture. Admission to the University of Memphis and completion of the major core do not guarantee placement in the program. Admission is selective and is based on a portfolio evaluation reflecting professional standards and expectations of the major. A portfolio that includes but is not limited to works from the major core courses is required as part of the application. Guidelines and application forms for admission to the Architecture major are available in the department office and from faculty advisors. Consultation with a faculty advisor is recommended before or during portfolio preparation. Students may submit portfolios for review no earlier than the semester that Candidacy requirements are being completed.

Transfer students must meet entrance requirements of the major. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any 3000-4000 level Architecture course is based upon this review.

# Completion of Major (52 hours)

- ARCH 2612 Computer Apps in Design 2 Credit Hours: (3)
- ARCH 2712 Design Studio 2 Credit Hours: (5)
- ARCH 3221 Determinants of Modern Design Credit Hours: (3)
- ARCH 3222 Contemporary Architecture 1 Credit Hours: (3)
- ARCH 3321 Structural Design 1 Credit Hours: (3)
- ARCH 3322 Structural Design 2 Credit Hours: (3)
- ARCH 3421 Environmental Systems Credit Hours: (3)
- ARCH 3613 Computer Apps in Design 3 Credit Hours: (3)
- ARCH 3713 Design Studio 3 Credit Hours: (5)
- ARCH 3714 Design Studio 4 Credit Hours: (5)
- ARCH 4231 Issues in City Building Credit Hours: (3)
- ARCH 4441 Construction Documents Credit Hours: (3)
- ARCH 4715 Design Studio 5 Credit Hours: (5)
- ARCH 4716 Design Studio 6 Credit Hours: (5)

## Electives (3 hours)

Architecture upper division (3/4000 level) elective to complete the 87 semester hours of Architecture course work. See advisor for details.

## Typical 4-Year Architecture Sequence

#### Freshman Year

- ARCH 1112 Architecture Graphics Studio Credit Hours: (3)
- ARCH 1120 Intro to Architecture + Design Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- ARCH 1111 Fundamentals of Design Studio Credit Hours: (3)
- ARCH 1113 Design Visualization Credit Hours: (3)
- ARCH 1211 History of Architecture 1 Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- MATH 1730 Pre-Calculus\*\* Credit Hours: (4) or MATH 1830 or MATH 1710 and MATH 1720 in lieu of MATH 1730

#### Note:

If the student does not qualify for MATH 1730, the student must begin math sequence in the fall of the first year. In lieu of MATH 1730, students may elect to take MATH 1710 + MATH 1720.

#### Semester Totals 36 hrs

#### Sophomore Year

- ARCH 2212 History of Architecture 2 Credit Hours: (3)
- ARCH 2411 Building Technology 1 Credit Hours: (3)
- ARCH 2611 Computer Apps in Design 1 Credit Hours: (3)
- ARCH 2711 Design Studio 1 Credit Hours: (5)

- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- ARCH 2412 Building Technology 2 Credit Hours: (3)
- ARCH 2612 Computer Apps in Design 2 Credit Hours: (3)
- ARCH 2712 Design Studio 2 Credit Hours: (5)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*

#### Semester Totals 35 hrs

#### Junior Year

- ARCH 3221 Determinants of Modern Design Credit Hours: (3)
- ARCH 3321 Structural Design 1 Credit Hours: (3)
- ARCH 3421 Environmental Systems Credit Hours: (3)
- ARCH 3613 Computer Apps in Design 3 Credit Hours: (3)
- ARCH 3713 Design Studio 3 Credit Hours: (5)
- ARCH 3222 Contemporary Architecture 1 Credit Hours: (3)
- ARCH 3322 Structural Design 2 Credit Hours: (3)
- ARCH 3714 Design Studio 4 Credit Hours: (5)
- ARTH 2010 World Art | Credit Hours: (3)

#### Semester Totals 31 hrs

#### Senior Year

- ARCH 4231 Issues in City Building Credit Hours: (3)
- ARCH 4441 Construction Documents Credit Hours: (3)
- ARCH 4715 Design Studio 5 Credit Hours: (5)
- ARTH 2020 World Art II Credit Hours: (3)
- ARCH 4421 Sustainable Design Credit Hours: (3) or approved upper division (3/4000 level) ARCH Elective
- ARCH 4716 Design Studio 6 Credit Hours: (5)
- ESCI 1010 Weather and Climate Credit Hours: (4) or ESCI 1020 or ESCI 1040

#### Semester Totals 26 hrs

#### Total Hours: 128

## Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

NOTES: Students may take MATH 1730 or MATH 1830. See Architecture Academic Advisor.

\*\*In addition to PHYS 2010/PHYS 2011, students may take ESCI 1010, ESCI 1020, ESCI 1040 with appropriate lab to satisfy Natural Science requirement.

# Art - Art Education Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

- ARTH 2010 World Art | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)

## The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

- ART 1210 Foundations Studio I Credit Hours: (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)

## Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Art Education (67 hours):

## Entrance (12 hours)

Note about Portfolio review: Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed.

- ART 2331 Painting | Credit Hours: (3)
- ART 2351 Intro to Printmaking Credit Hours: (3)
- ART 2511 Sculpture | Credit Hours: (3)
- ART 2523 Ceramics | Credit Hours: (3)

### Art History (3 hours)

One upper division (3/4000 level) art history course.

• UD ARTH elective

#### Completion of Concentration (43 hours)

- ART 3411 Art for Children Credit Hours: (3)
- ART 3423 Art Secondary Schools Credit Hours: (3)

- ART 4321 Drawing and Painting | Credit Hours: (3)
- ART 4427 Method/Materials Art Instruc Credit Hours: (3)
- ART 4441 Art Ed Prof Seminar Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- ART 4912 Art Education Residency II Credit Hours: (9)
- ART 4430 Community Art Project Credit Hours: (1)
- ART 4440 Analysis of Teaching Credit Hours: (4)
- ART 4914 Art Education Residency | Credit Hours: (5)

## Art Electives (9 hours)

A studio specialty of three or four courses in the same field is also required; see adviser for details. All required 2000 level art courses must be completed before enrollment in 4000 level studio classes. Art electives complete the 79 semester hours of professional course work.

#### Note:

See the introduction to the College of Communication and Fine Arts requirements at the Teacher Preparation section.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

## Typical 4-Year Art Education Concentration Sequence

### **Freshman Year**

- ART 1210 Foundations Studio I Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Math\* (3)
- Natural Science\* (4)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences\* (3)
- Natural Science\* (4)

#### Semester Totals 32 hrs

#### Sophomore Year

- ART 2511 Sculpture | Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ARTH 2010 World Art | Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ART 2523 Ceramics | Credit Hours: (3)

- ART 2351 Intro to Printmaking Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ART 2331 Painting | Credit Hours: (3)

#### Semester Totals 30 hrs

#### Junior Year

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ART 3411 Art for Children Credit Hours: (3)
- ART elective studio (3)
- History/American Heritage
- Social Science (3)
- ART 4321 Drawing and Painting | Credit Hours: (3)
- ART 3423 Art Secondary Schools Credit Hours: (3)
- ART 4430 Community Art Project Credit Hours: (1)
- Art elective for specialty
- Art elective studio (3)
- History/American Heritage (3)

#### Semester Totals 31 hrs

#### Senior Year

- UD ARTH elective (3)
- ART 4914 Art Education Residency | Credit Hours: (5)
- ART 4427 Method/Materials Art Instruc Credit Hours: (3)
- ART 4440 Analysis of Teaching Credit Hours: (4)
- ART 4441 Art Ed Prof Seminar Credit Hours: (3)
- ART 4912 Art Education Residency II Credit Hours: (9) or ICL 4912

#### Semester Totals 27 hrs

Total Hours: 120

### Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Art - Graphic Design Concentration, (B.F.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

- ARTH 2010 World Art | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)

## The Major (79 hours)

### Major Core (Foundation in Art) (12 hours)

- ART 1210 Foundations Studio I Credit Hours: (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)

## Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Graphic Design (67 hours):

# Entrance (10 hours)

Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed. Enrollment in 3000 or 4000 level graphic design courses is based upon this review.

- ART 2213 Typographic Design | Credit Hours: (3)
- ART 2219 Visual Thinking Credit Hours: (3)
- ART 2223 Computer Assisted Graphc Des Credit Hours: (3)
- ART 3210 Graphic Des Candidacy Review Credit Hours: (1)

### Art History (9 hours)

- ART 4224 History Graphic Design Credit Hours: (3)
- 2 upper division art history courses

#### Note:

COMM 4850 may be substituted for one art history course.

### Completion of Concentration (39 hours)

- ART 2701 Photography | Credit Hours: (3)
- ART 3213 Typographic Design II Credit Hours: (3)
- ART 3219 Image Design Credit Hours: (3)
- ART 3222 Graphic Design Method Credit Hours: (3)
  - The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- ART 3227 Electronic Pre-Press Prod Credit Hours: (3)
- ART 3313 Drawing And Composition Credit Hours: (3)
- ART 3314 Drawing And Concepts Credit Hours: (3)
- ART 4211 Writing/Design Process Credit Hours: (3)
- ART 4220 Print Communication Design Credit Hours: (3)
- ART 4560 Interactive Media Design Credit Hours: (3)
- ART 4223 Special Studies/Graphic Des Credit Hours: (3-12) (may be taken more than once)
- ART 4233 Design Practice Studio Credit Hours: (3-12) (may be taken more than once)
- ART 4235 Graphic Design Portfolio Credit Hours: (3)
- ART 4230 Graphic Design Internship Credit Hours: (3)

## Art Electives (9 hours)

Art electives complete the 79 hours of professional course work.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Graphic Design Concentration Sequence

## **Freshman Year**

- ART 1210 Foundations Studio | Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ARTH 2010 World Art | Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ART 2223 Computer Assisted Graphc Des Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

- ART 2213 Typographic Design I Credit Hours: (3)
- ART 2701 Photography | Credit Hours: (3)
- ART 2219 Visual Thinking Credit Hours: (3)
- ART 3210 Graphic Des Candidacy Review Credit Hours: (1)
- ARTH elective (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- ART 3213 Typographic Design II Credit Hours: (3)

- ART 3219 Image Design Credit Hours: (3)
- Natural Sciences\* (4)
- ART elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- ART elective (3)
- ART 3313 Drawing And Composition Credit Hours: (3) or ART 3314 Drawing And Concepts
- ART 3227 Electronic Pre-Press Prod Credit Hours: (3)
- ARTH elective (3)
- Natural Science\* (4)
- ART 3222 Graphic Design Method Credit Hours: (3)
- ART 4220 Print Communication Design Credit Hours: (3)
- ART 4224 History Graphic Design Credit Hours: (3)
- Social/Behavioral Sciences\* (3)
- History (3)

#### Semester Totals 31 hrs

### Senior Year

- ART 4233 Design Practice Studio Credit Hours: (3-12)
- ART 4560 Interactive Media Design Credit Hours: (3)
- ART 4211 Writing/Design Process Credit Hours: (3)
- History\* (3)
- ART elective (3)
- Graphic Design Elective
- ART 4223 Special Studies/Graphic Des Credit Hours: (3-12)
- ART 4235 Graphic Design Portfolio Credit Hours: (3)
- Social/Behavioral Sciences\* (3)

#### Semester Totals 27 hrs

## Total Hours: 120

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Art - Photography Concentration, (B.F.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

- ARTH 2010 World Art I Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)

## The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

- ART 1210 Foundations Studio I Credit Hours: (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)

## Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Photography (67 hours):

## Entrance (18 hours)

Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed. Enrollment in 3000 or 4000 level studio courses is based upon this review.

- ART 2701 Photography | Credit Hours: (3)
- ART 2702 Photography II Credit Hours: (3)
- ART 3301 Digital Art Credit Hours: (3)
- ART 3701 Photography III Credit Hours: (3) Choose one of these two options:
- ART 2331 Painting | Credit Hours: (3)
- ART 2351 Intro to Printmaking Credit Hours: (3)

#### Choose one of these two options:

- ART 2511 Sculpture | Credit Hours: (3) or
- ART 2523 Ceramics | Credit Hours: (3)

## Art History (9 hours)

Choose three classes from the options listed below.

- ARTH 4155 High Modern Art Credit Hours: (3)
- ARTH 4157 Contemp Art/Theory/Criticism Credit Hours: (3)
- ARTH 4721 History Photography | Credit Hours: (3)

• ARTH 4722 - History Photography II Credit Hours: (3)

## Completion of Concentration (31 hours)

Required Courses

- ART 4650 Profess Art Practices Credit Hours: (3)
- ART 4711 Adv Photography Seminar Credit Hours: (1-3)
- ART 4712 Photography Portfolio Seminar Credit Hours: (1-3)
- ART 4990 Senior Thesis Preparation Credit Hours: (3)
- ART 4995 Senior Thesis Exhibition Credit Hours: (3)
- ART 3000 Photography Lab Management Credit Hours: (1) Plus five 4000 level courses including but not limited to the following:
- ART 4701 Color Photography Credit Hours: (3)
- ART 4702 Photographic Material/Process Credit Hours: (3)
- ART 4703 Alternative Photogrphc Process Credit Hours: (3)
- ART 4704 Photographic Lighting Credit Hours: (3)
- ART 4705 Video for Artists Credit Hours: (3)
- ART 4353 Computer Image Print/Photo I Credit Hours: (3)
- ART 4354 Computer Image Print/Photo II Credit Hours: (1-3)

# Art Electives (9 hours)

Art and/or Art history electives complete the 79 semester hours of course work.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Art Sequence Photography Concentration

## Freshman Year

First Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ART 1210 Foundations Studio | Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ART 2701 Photography | Credit Hours: (3)
- \*Social/Behavioral Science Credit Hours: (3)

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 2702 Photography II Credit Hours: (3)
- \*Social/Behavioral Science Credit Hours: (3)

### Semester Totals 30 Hours

### Sophomore Year

First Semester

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ART 3701 Photography III Credit Hours: (3)
- ART 3301 Digital Art Credit Hours: (3)
- ARTH 2010 World Art | Credit Hours: (3) or ARTH 2020 or ARTH 2030
- \*History Credit Hours: (3)

#### Second Semester

- \*MATH Credit Hours: (3)
- ART 2511 Sculpture | Credit Hours: (3) or ART 2523
- ARTH 2020 World Art II Credit Hours: (3) or ARTH 2030
- \*History Credit Hours: (3)
- ART 3000 Photography Lab Mgmt Credit Hours: (1)
- ART 4000 Level Photography Class Credit Hours: (3)

#### Semester Totals 31 Hours

#### Junior Year

#### First Semester

- ART 2331 Painting | Credit Hours: (3) or ART 2351
- ART 4711 Adv Photography Seminar Credit Hours: (1-3)
- \*Natural Science Credit Hours: (4)
- ARTH Elective **Credit Hours:** (3)
- ART 4000 Level Photography Class **Credit Hours:** (3)

#### Second Semester

- ART 4712 Photography Portfolio Seminar Credit Hours: (1-3)
- ART 4000 Level Photography Class **Credit Hours:** (3)
- Art Elective **Credit Hours:** (3)
- ARTH Elective **Credit Hours:** (3)
- \*Natural Science Credit Hours: (4)

#### Semester Totals 32 Hours

### Senior Year

#### First Semester

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ART 4650 Profess Art Practices Credit Hours: (3)
- ART 4990 Senior Thesis Preparation Credit Hours: (3)
- ART 4000 Level Photography Class Credit Hours: (3)
- ARTH Elective Credit Hours: (3)

#### Second Semester

- ART 4995 Senior Thesis Exhibition Credit Hours: (3)
- ART 4000 Level Photography Class Credit Hours: (3)
- ART 4000 Level Photography Class Credit Hours: (3)
- Art Elective Credit Hours: (3)

#### Semester Totals 27 Hours

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Art - Studio Arts Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

- ARTH 2010 World Art I Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)

## The Major (79 hours)

### Major Core (Foundation in Art) (12 hours)

- ART 1210 Foundations Studio | Credit Hours: (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)

## Concentration

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration portfolio review occurs upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus three additional entry level courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Studio Arts (67 hours):

The four fields are interdependent and share the following requirements:

# Entry Level Courses (18 hours)

- ART 2331 Painting | Credit Hours: (3)
- ART 3301 Digital Art Credit Hours: (3)
- ART 2351 Intro to Printmaking Credit Hours: (3)
- ART 2511 Sculpture | Credit Hours: (3)
- ART 2523 Ceramics | Credit Hours: (3)
- ART 2701 Photography | Credit Hours: (3)

# Art History (6 hours)

• ARTH 4155 - High Modern Art Credit Hours: (3)

or

- ARTH 4157 Contemp Art/Theory/Criticism Credit Hours: (3)
- Plus 3 hours in upper division art history courses

## Required Studio Courses (37 hours)

Required studio courses (16 hrs), plus seven upper level studio courses.

- ART 3313 Drawing And Composition Credit Hours: (3)
- ART 3314 Drawing And Concepts Credit Hours: (3)
- ART 4650 Profess Art Practices Credit Hours: (3)
- ART 4990 Senior Thesis Preparation Credit Hours: (3)
- ART 4995 Senior Thesis Exhibition Credit Hours: (3)
- ART 4622 Workshop in Art II Credit Hours: (1-3) (1)

7 Upper Level Studio Courses (21 hours) From:

Ceramics:

- ART 3522 Kilns/Glazes/Tech Skill Credit Hours: (3)
- ART 3524 Ceramics II Credit Hours: (3)
- ART 4521 Ceramics III Credit Hours: (3)
- ART 4522 Ceramics IV Credit Hours: (3)

#### Painting:

- ART 3332 Painting II Credit Hours: (3)
- ART 4169 Mural Painting as Public Art Credit Hours: (3)
- ART 4321 Drawing and Painting | Credit Hours: (3)
- ART 4322 Drawing and Painting II Credit Hours: (3)
- ART 4331 Painting III Credit Hours: (3)
- ART 4332 Painting IV Credit Hours: (3)
- ART 4333 Painting V Credit Hours: (3)

#### Printmaking:

- ART 2352 Intro Intaglio/Lithography Credit Hours: (3)
- ART 3351 Intaglio Printmaking Credit Hours: (3)
- ART 3352 Lithography Credit Hours: (3)
- ART 4351 Adv Printmaking | Credit Hours: (3)
- ART 4352 Adv Printmaking II Credit Hours: (3)
- ART 4353 Computer Image Print/Photo I Credit Hours: (3)
- ART 4354 Computer Image Print/Photo II Credit Hours: (1-3)

#### Sculpture:

- ART 3511 Sculpture II Credit Hours: (3)
- ART 3512 Sculpture III Credit Hours: (3)
- ART 4511 Sculpture IV Credit Hours: (3)
- ART 4512 Sculpture V Credit Hours: (3)

#### Independent Studies and Book Arts:

- ART 4621 Workshop in Art I Credit Hours: (1-3)
- ART 4314 Art of the Book Credit Hours: (3)

#### Note

All 2000 level art courses must be completed before enrollment in 4000 level studio courses.

# Art Electives (6 hours)

Art electives complete the 79 semester hours of professional course work.

# Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Studio Arts Concentration Sequence

## Freshman Year

- ART 1210 Foundations Studio | Credit Hours: (3)
- ART 1311 Drawing | Credit Hours: (3)
- ARTH 2010 World Art I Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3)
- ART 1215 Foundations Studio II Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ART 2701 Photography | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

- ART 2331 Painting | Credit Hours: (3)
- ART 3301 Digital Art Credit Hours: (3)
- ART 2511 Sculpture | Credit Hours: (3)
- ARTH 4155 High Modern Art Credit Hours: (3) or ARTH 4157 Contemp Art/Theory/Criticism
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ART 3313 Drawing And Composition Credit Hours: (3)
- ART 2351 Intro to Printmaking Credit Hours: (3)
- ART 2523 Ceramics | Credit Hours: (3)
- ARTH elective (3)
- Natural Science\* (4)

63

### Semester Totals 34 hrs

## Submit portfolio for Concentration Entrance

## Junior Year

- ART 3314 Drawing And Concepts Credit Hours: (3)
- ART (Upper level studio course-1) (3)
- ART (Upper level studio course-2) (3)
- ART (Upper level studio course-3) (3)
- Natural Science (4)
- ART (Upper level studio course-4) (3)
- ART (Upper level studio course-5) (3)
- ART (Upper level studio course-6) (3)
- Social/Behavioral Sciences\* (3)
- History\* (3)

## Semester Totals 31 hrs

## Senior Year

- ART (Upper level studio course-7) (3)
- ART 4650 Profess Art Practices Credit Hours: (3)
- ART 4990 Senior Thesis Preparation Credit Hours: (3)
- ART 4622 Workshop in Art II Credit Hours: (1-3)
- History\* (3)
- ART 4995 Senior Thesis Exhibition Credit Hours: (3)
- ART or ARTH elective (3)
- ART or ARTH elective (3)
- Social/Behavioral Sciences\* (3)

### Semester Totals 25 hrs

## Total Hours: 120

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Art History - African Diaspora Arts and Visual Culture Concentration, (B.A.)

# Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

# University General Education Program (41 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2030 - Visual Studies/Indigenous Arts and either ARTH 2010 - World Art I or ARTH 2020 - World Art II

65

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (42 hours)

Completion of 36 hours in art history courses including:

• a minimum of 6 hours of studio art. These courses can be taken from the studio concentration under Art-Studio Arts Concentration, (B.F.A).

# African Diaspora Arts and Visual Culture

African Diaspora Arts and Visual Culture is an interdisciplinary area of concentration within the B.A. in Art History. Its mission is to introduce students to the theoretical frameworks and methodologies for approaching the study of the diverse arts and visual cultures of peoples of African descent. Art and visual culture are examined in relation to the broader African diaspora, whereby students acquire analytical skills that enhance their understanding of historical and contemporary issues from a global perspective. Students supplement the Art History curriculum with courses drawn from a variety of disciplines. The program objectives for the concentration in African Diaspora Arts and Visual Culture emphasize research employing original sources, the ability to think and read critically, the skill of writing meaningfully, and the application of acquired knowledge in the context of cultural institutions such as museums, galleries, and historical sites.

## Within the Requirements for the Major in Art History

Within the requirements for the major in Art History, students in this concentration need to complete:

• ARTH 4185 - African American Art Credit Hours: (3)

### Plus Two Courses from Museum Studies selected from:

- ARTH 4381 Art Curatorial Techniques Credit Hours: (3)
- ARTH 4386 Introduction to Museums Credit Hours: (3)
- ARTH 4660 Museum Collections Credit Hours: (3)
- ARTH 4662 Museum Exhibitions Credit Hours: (3)

### Plus an additional 9 hours from ARTH 4000-level series

## Electives (18-19 hours)

For the concentration in African Diaspora Arts and Visual Culture, students also need to take two courses outside the Department of Art selected from the following:

- ENGL 3325 Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3)
- ENGL 3326 Af/Am Lit since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4373 Af/Am Author since Harlem Ren \*\* Credit Hours: (3)
- HIST 4222 Race/Class in Latin America Credit Hours: (3)
- HIST 4288 West Africa/Diaspora \*\* Credit Hours: (3)
- HIST 4879 Africa to the Americas Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)

# Freshmen Year

- ARTH 2010 World Art | Credit Hours: (3) or ARTH 2030 Visual Studies/Indigenous Arts
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3)\*
- Foreign Language/BA (or elective) (3)\*\*
- Elective (3)
- ARTH 2020 World Art II Credit Hours: (3) or ARTH 2010 World Art I
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Humanities/Fine Arts (3)
- Foreign Language/B.A. (or elective) (3)\*\*
- Studio Elective (3)

## Semester Totals 30 hours

## Sophomore Year

- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/B.A. (3)
- Math (3)\*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/B.A. (3)
- Elective (3)
- History (3)\*

## Semester Totals 33 hrs

### Junior Year

- ARTH elective (3)
- Elective (3)
- Social/Behavior Sciences (3)\*
- Natural Science (4)\*
- ARTH elective (3)
- ARTH elective (3)
- Social/Behavior Sciences (3)\*
- Natural Science (4)\*

## Semester Totals 26 hours

Senior Year

- ARTH elective (3)
- ARTH elective (3)
- UD Elective (3)
- Studio Elective (3)
- History (3)\*
- ARTH 4195 Proseminar Art History
- Elective (3)
- UD Elective (3)
- UD Elective (3)
- UD Elective (3)
- Elective (1)

Semester Totals 31 hours

## Total Hours: 120-121

## Total Hours required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*\*If student chooses ARTH 2030, then must also take an additional General Education Humanities/Fine Arts course instead of an elective.

# Art History - Ancient Egyptian Art and Culture Concentration, (B.A.)

# Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2010 - World Art I and ARTH 2030 - Visual Studies/Indigenous Arts.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (42 hours)

Completion of 36 hours in art history courses, including:

• ARTH 4195 - Proseminar Art History

A minimum of 6 hours of studio art. These courses can be taken from the studio courses listed under Art-Studio Arts Concentration, (B.F.A.)

# Ancient Egyptian Art and Culture

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

The study of Ancient Egyptian art is by its very nature interdisciplinary, combining elements of visual analysis and art historical methods with textual evidence and archaeological and epigraphic fieldwork. This concentration will introduce students, at the undergraduate level, to various aspects of ancient Egyptian culture, focusing primarily on its art and its language and literature. The Egyptian objects currently in the collection of the Institute of Egyptian Art & Archaeology, both on display and in storage, provide an invaluable asset to this program and will greatly enhance the students' learning experience.

68

## Within the Requirements for the Major in Art History

Within the requirements for the major in Art History, students in this concentration need to complete:

- ARTH 2010 World Art I Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)
- ARTH 4112 Egypt Art-Old Kingdom Credit Hours: (3)
- ARTH 4113 Egypt Art-New Kingdom Credit Hours: (3)

#### Plus two courses of

Two semesters of Middle Egyptian (arranged as ARTH 4197) must be taken during the student's final year of study and do not meet the Foreign Language requirement for the B.A. Students in this concentration are encouraged to take either French or German to meet their Foreign Language requirement.

• ARTH 4197 - Adv Indiv Research/ARTH Credit Hours: (3) (two semesters of Middle Egyptian I and II)

#### Plus two courses selected from

- ARTH 4119 Late Antique/Islamic Art/Egypt Credit Hours: (3)
- ARTH 4121 Ancient Art Near East Credit Hours: (3)
- ARTH 4123 Greek Art Credit Hours: (3)
- ARTH 4124 Roman Art Credit Hours: (3)
- ARTH 4125 Art/Archaeology Pompeii Credit Hours: (3)
- ARTH 4183 Visual Arts of Africa Credit Hours: (3)

Plus an additional 9 hours ARTH 4000-level series

# Electives (18-19 hours)

Students in this concentration need to take two courses outside of the Department of Art, including:

• HIST 4323 - Egypt of the Pharaohs \*\* Credit Hours: (3)

Plus one of the following:

- ANTH 3300 Ancient Civilizations Credit Hours: (3)
- ANTH 4352 Archaeology/World Prehistory Credit Hours: (3)
- HIST 3320 Ancient World \*\* Credit Hours: (3)
- HIST 4320 Ancient Near East Credit Hours: (3)
- HIST 4321 Greek Experience \*\* Credit Hours: (3)
- HIST 4322 The Roman World Credit Hours: (3)

# Typical 4-Year Art History Sequence

## Freshman Year

- ARTH 2010 World Art | Credit Hours: (3) \*\*\* or ARTH 2030 Visual Studies/Indigenous Arts\*\*\*
  - The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities (3) \*
- Foreign Language/B.A. (or elective) (3) \*\*
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Fine Arts (3) \*
- Foreign Language/B.A. (or elective) (3) \*\*
- Studio elective (3)
- ARTH 2010 Survey of Art History I\*\* or ARTH 2030 Visual Studies/Indigenous Arts

#### Semester Totals 30 hrs

### Sophomore Year

- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/B.A. (3)
- MATH (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/B.A. (3)
- Elective (3)
- History (3) \*

#### Semester Totals 33 hrs

#### Junior Year

- ARTH elective (3)
- Elective (3)
- Social/Behavioral Sciences (3) \*
- Natural Science (4) \*
- ARTH elective (3)
- ARTH elective (3)
- Social/Behavioral Sciences (3) \*
- Natural Science (4) \*

#### Semester Totals 26 hrs

#### Senior Year

- ARTH Elective (3)
- UD Elective (3)
- UD Elective (3)
- Studio Elective (3)
- History (3)

- ARTH 4195 Proseminar Art History
- UD Elective (3)
- UD Elective (3)
- Elective (3)
- Elective (1)

#### Semester Totals 31 hrs

#### Total Hours: 120-121

## Total Hours required for Graduation: 120

\* Must satisfy University General Education Program Requirements.

\*\*\* If student chooses ARTH 2030, then must also take an additional General Education Humanities/Fine Arts course instead of an elective.

# Art History - European Tradition in Art Concentration, (B.A.)

# Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2010 - World Art I and ARTH 2020 - World Art II.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (42 hours)

Completion of 36 semester hours in art history, including:

• ARTH 4195 - Proseminar Art History

A minimum of 6 hours of studio art is also required. These courses can be taken from the studio courses listed under Art-Studio Arts Concentration, (B.F.A.).

## European Tradition in Art

The European tradition is an area of concentration within the B.A. in Art History, whose mission is to introduce students to the visual cultures of the Western world, from antiquity to the modern (and postmodern) age. The concentration offers coursework covering the diverse visual traditions and the variety of historical periods associated with Europe and the Americas. The concentration emphasizes that its students acquire the ability to read, write and understand the major concepts of art history and to conduct original research in the discipline.

## Within the Requirements for the Major in Art History,

Within the requirements for the major in Art History, students in this concentration need to complete:

- ARTH 2010 World Art | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)

One course each from five of the following Art Historical Categories

#### Classical

- ARTH 4123 Greek Art Credit Hours: (3)
- ARTH 4124 Roman Art Credit Hours: (3)
- ARTH 4125 Art/Archaeology Pompeii Credit Hours: (3)

#### Medieval

- ARTH 4129 Ancient/Medieval Architecture Credit Hours: (3)
- ARTH 4130 Art/Medieval World Credit Hours: (3)
- ARTH 4131 Art/Early Middle Ages Credit Hours: (3)
- ARTH 4134 Art/High Middle Ages Credit Hours: (3)

#### Renaissance-Baroque

- ARTH 4141 Early Renaissance Italy Credit Hours: (3)
- ARTH 4142 North Renaissance Art Credit Hours: (3)
- ARTH 4143 High Renaissance Italy Credit Hours: (3)
- ARTH 4146 Baroque Art Credit Hours: (3)

#### Modern European

- ARTH 4148 Neo-Class/Romanticism Credit Hours: (3)
- ARTH 4149 Realism & Impressionism Credit Hours: (3)
- ARTH 4152 Early Modern Art Credit Hours: (3)
- ARTH 4153 Cubism through Surrealism Credit Hours: (3)
- ARTH 4721 History Photography | Credit Hours: (3)

#### American

- ARTH 4158 Modern Architecture Credit Hours: (3)
- ARTH 4166 American Art: 1500s-1940s Credit Hours: (3)
- ARTH 4185 African American Art Credit Hours: (3)
- ARTH 4722 History Photography II Credit Hours: (3)

#### Contemporary

- ARTH 4155 High Modern Art Credit Hours: (3)
- ARTH 4157 Contemp Art/Theory/Criticism Credit Hours: (3)

### An additional 9 hours ARTH 4000-level series

72 A maximum of two courses from the Museum Studies sequence (ARTH 4381, ARTH 4386, ANTH 4660, or ANTH 4662) may be selected when meeting the remaining 9 hours ARTH 4000-level series.

# Typical 4-Year Art History Sequence

## Freshmen Year

- ARTH 2010 World Art I Credit Hours: (3) or ARTH 2020 World Art II
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities (3)\*
- Foreign Lanuguage/BA (or elective) (3)\*\*
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Fine Arts (3)\*
- Foreign Lanuguage/BA (or elective) (3)\*\*
- Studio Elective (3)
- ARTH 2010 World Art I or ARTH 2020 World Art II Credit Hours: (3)

### Semester Totals 30 hrs

## Sophomore Year

- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/BA (3)
- Math (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ARTH elective (3)
- ARTH elective (3)
- Foreign Language/BA (3)
- Elective (3)
- History (3)\*

### Semester Totals 33 hrs

#### Junior Year

- ARTH elective (3)
- Elective (3)
- Social/Behavioral Sciences (3) \*
- Natural Science (4) \*
- ARTH elective (3)
- ARTH elective (3)
- Social/Behavioral Sciences (3) \*
- Natural Science (4) \*

#### Semester Totals 26 hrs

### Senior Year

- ARTH Elective (3)
- UD Elective (3)
- UD Elective (3)
- Studio Elective (3)
- History (3)
- ARTH 4195 Proseminar Art History
- UD Elective (3)
- UD Elective (3)
- Elective (3)
- Elective (1)

### Semester Totals 31 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Baccalaureate Contract Program (Design Your Own Degree)**

Baccalaureate Contract Program (Design Your Own Degree)

Undergraduate students admitted to the College of Professional & Liberal Studies may design either of two degrees through the Baccalaureate Contract Program: the Bachelor of Liberal Studies (B.L.S.) or the Bachelor of Professional Studies (B.P.S.). To be eligible for this program, a student must have a cumulative undergraduate grade point average of 2.0. Upper-division courses within the student's Coordinated Study (i.e., major) must be from two or more departments on campus. In addition, the proposed degree must be unlike any other degree offered by the University of Memphis. All baccalaureate contracts will be reviewed and approved by a baccalaureate contract advisor and by the Assistant Director of Student Services in the College of Professional & Liberal Studies. The baccalaureate contract must include work to be completed in the following areas: (1) General Education, (2) Coordinated Study, (3) Thematic Studies, (4) a Senior Project, and (5) General Electives.

Additional information may be found on the College of Professional & Liberal Studies website.

## University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

## College Requirements (9 hours)

## Coordinated Study (33 or 36 hours)

33 or 36 upper-division hours from at least two disciplines/departments (Please note: A minimum of 12 hours in each discipline is required and no more than 21 hours in one subject area. Courses must tie together into a cohesive program.)

## Thematic Studies (6 hours)

## Senior Project (3 hours)

3 credit hours of Senior Project

## **General Electives**

Approved general electives to bring the total hours earned to 120.

## Graduation Requirements

- At least 120 semester hours total with at least 42 upper division hours
- At least 30 semester hours must be awarded by UofM
- At least 45 semester hours at the 3000-4000 level

## Additional Information

Additional information may be found on the College of Professional & Liberal Studies website.

## Biology, (B.S.)

Students who earn a B.S. in Biology should attain the following objectives: (a) demonstrate knowledge and comprehension of the principles, concepts, and theories pertinent at each level of biological organization; (b) apply principles of biological classification to the diversity of life and recognize phylogenetic relationships among organisms; (c) demonstrate skills in analytical reasoning and problem solving; (e) function successfully in laboratory and field settings, including the use of basic equipment, techniques, and safety protocols; (f) access, evaluate, and utilize biological information in print and electronic formats; (g) effectively communicate scientific knowledge and experimental results in both oral and written formats; (h) compete successfully for admission to graduate and professional programs and for employment utilizing their academic training.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: Biology majors are also required to take either MATH 1830 or MATH 1910 and these courses will fulfill general education requirements.

Eight credit hours of natural science courses (two lectures with labs) are required for general education and can be fulfilled by the following courses that are required for the Biology major.

- BIOL 1110 General Biology I
- BIOL 1111 General Biology I Lab
- BIOL 1120 General Biology II
- BIOL 1121 General Biol II Lab

## The Major (67-68 hours)

### Biology Requirements (18 hours):

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3) (fulfills general education requirements)
- BIOL 1121 General Biol II Lab Credit Hours: (1) (fulfills general education requirements)
- BIOL 3072 Genetics Credit Hours: (3)

- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 4100 Evolution Credit Hours: (3)

#### Additional Science and Math Requirements (27-28 hours):

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3) (fulfills general education requirements) or
- MATH 1910 Calculus I \*\* Credit Hours: (4) (fulfills general education requirements)
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab I Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

18 Additional Upper Division Hours in BIOL Courses Approved by the Department Including One Organismal Diversity Course From Among:

- BIOL 3050 Ecology Credit Hours: (4)
- BIOL 3200 General Botany Credit Hours: (4)
- BIOL 3620 Comp Anatomy of Vertebrts Credit Hours: (5)
- BIOL 4245 Plant Systematics/Evolution Credit Hours: (4)
- BIOL 4375 Molec Biol/Parasite Credit Hours: (4)
- BIOL 4640 Ornithology Credit Hours: (4)
- BIOL 4740 Mammalogy Credit Hours: (4)
- BIOL 4744 Herpetology Credit Hours: (4)
- BIOL 4900 Entomology Credit Hours: (4)

Plus One Additional Laboratory or Lecture/Laboratory Course

### **Required Support Courses:**

Select courses from each of the following three areas for a total of 12 hours:

Science Ethics (one course):

 PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

Upper Division Social Science (one course):

- ANTH 3111 Human Paleontology Credit Hours: (3)
- ANTH 4111 Evolution and Human Health Credit Hours: (3)
- ANTH 4511 Medical Anthropology Credit Hours: (3)
- ANTH 4521 Culture, Soc & Mental Health Credit Hours: (3)
- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- ANTH 4551 Culture/Sex/Childbirth Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- ECON 4740 Health Care Economics Credit Hours: (3)
- ESCI 4201 Urbanization/Environment Credit Hours: (3)
- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 4252 Global Environmental Change Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3307 Animal Behavior \*\* Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- PSYC 4305 Mind/Brain/Intelligence \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)

#### Skills Courses (two courses):

- CLAS 3021 Medical Terminology Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4) or
- COMP 4001 Intro to Python Programming Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ESCI 4511 Remote Sensing/Environ Credit Hours: (3)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3) or
- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- PSYC 3020 Research and Statistics II \*\* Credit Hours: (4) or
- Foreign Language: 6 hours in a single foreign language, or equivalent. If the language chosen was used to meet University admissions requirements, students must take the foreign language placement exam and complete two sequential courses beginning with the course into which placed by the exam. If a different language is chosen, any six hours will fulfill the requirement.

### Electives

Electives must be chosen to bring the total number of hours to 120.

### Notes:

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the major, the minor, and in all required chemistry, physics, and mathematical courses. BIOL, CHEM, MATH, and PHYS courses applicable toward the major or minor may not be taken more than three times.

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements.

## Typical 4-Year Biology Sequence

### Freshman Year

#### First Semester

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3) or
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Social Sciences (3) \*

#### Second Semester

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- Humanities (3) \*

### Semester Totals 27-28 hrs

### Sophomore Year

#### First Semester

- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Social Sciences (3) \*
- History (3) \*

#### Second Semester

• BIOL 3130 - Cell Biology Credit Hours: (3)

- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Elective (3)
- Skills Course (3-4)

#### Semester Totals 33-34 hrs

#### Junior Year

#### First Semester

- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- PHYS (4)
- UD BIOL (3) (Undergraduate research is strongly encouraged as part of BIOL elective hours)
- Skills Course (3-4)

#### Second Semester

- BIOL 4100 Evolution Credit Hours: (3)
- PHYS (4)
- UD BIOL (4)
- Humanities (3) \*

#### Semester Totals 28-29 hrs

#### Senior Year

#### **First Semester**

- Science Ethics (3)
- UD BIOL (4)
- UD BIOL (3)
- Elective (3)
- Elective (3)

#### Second Semester

- History (3) \*
- UD BIOL (4)
- UD Social Science (3)
- Elective (3)
- Elective (1-3)

### Semester Totals 32 hrs

### Total Hours Required for Graduation with B.S. (120-123)

\*Must satisfy University General Education Program Requirement.

\*\*Courses offered only online or both online and on-ground

## **Biomedical Engineering**, (B.S.B.E.)

## Graduation

To qualify for the degree of Bachelor of Science in Biomedical Engineering, the student must satisfy University and College requirements, obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, physics, biology, and chemistry courses used to satisfy degree requirements. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

## Honors Program

The Biomedical Engineering Honors Program is for highly motivated and high-achieving students that provides special opportunities to advance the career and professional development of the student. The program aims to develop student talents, interests, and abilities within a curriculum, as well as encouraging independence and creativity.

Students are eligible for the honors program in Biomedical Engineering if they have, and maintain, a cumulative GPA of 3.4 with at least junior standing, and have received approval from the departmental honors committee. The honors program in Biomedical Engineering requires a minimum of 10 hours of upper-division biomedical engineering honors courses, including both BIOM 4800 BME Honors seminar, and completion of an honors thesis (BIOM 4999). Students who complete the honors program and the requirements for the B.S. in Biomedical Engineering will be recognized at the commencement ceremony by having their degree conferred "With Honors in Biomedical Engineering." Honors designation will also appear on the student's diploma and academic transcript.

## University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

### Communication:

• ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences:

Must be taken in addition to 3 hours from the other specified choices

• ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)

### Natural Science:

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

### History:

American history waived for B.S.B.E. students who have completed one unit of American history in high school.

## College and Degree Requirements (26 hours)

### Mathematics (11 hours)

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

### Natural Science (8 hours)

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1)

### Collateral Course (7 hours)

- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- EECE 2201 Circuit Analysis | Credit Hours: (3) And
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1) Or
- EECE 2283 Electrical Engr/Instrumntation Credit Hours: (3) And
- EECE 2281 Instrumentation Lab Credit Hours: (1)

## The Major (63 hours)

### Completion of 42 hours from

- BIOM 1701 Introduction to Biomedical Engineering Design Credit Hours: (1)
- BIOM 1702 Biomedical Engineering Visualization Credit Hours: (1)
- BIOM 1720 Intro Biomed Engr Tools Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1) or
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- BIOM 2720 Experimental Design Analysis Credit Hours: (3)
- CIVL 2131 Statics Credit Hours: (3)
- MECH 2320 Mechanics of Materials Credit Hours: (3) or
- MECH 2332 Dynamics Credit Hours: (3)
- BIOM 3010 Medical Measurements Credit Hours: (4)
- BIOM 3110 Med Physiology/BIOM Credit Hours: (3) or
- BIOL 3730 Vertebrate Physiology Credit Hours: (4)
- BIOM 3710 Physiological System/Modeling Credit Hours: (3)

- BIOM 4730 Biomaterials Credit Hours: (4)
- BIOM 4760 Biomed Engr Design Principles Credit Hours: (3)
- BIOM 4782 Biomedical Design Practicum Credit Hours: (1)
- BIOM 4784 Biomedical Design Studio Credit Hours: (2)

### Completion of 21 hours of

Completion of 21 hours of BIOM, Engineering and Technical electives approved by the advisor. At least 6 hours must be satisfied with BIOM electives. Nine hours of electives must be chosen from upper division engineering courses including BIOM courses. Six hours of technical electives may be chosen from upper division courses in BIOL, BIOM, CHEM, EECE, MATH, MECH, PHYS and TECH. Courses at this level in other departments can be chosen with permission of the chair or the chair's designee. Some courses to meet these requirements are:

- BIOM 4720 Bioelectricity Credit Hours: (4)
- BIOM 4750 Biomechanics Credit Hours: (4)
- BIOM 4702 Biotechn Tools for BME Res Credit Hours: (3)
- BIOM 4205 Intro Biomed and Chem Sensors Credit Hours: (4)
- BIOM 4393 Appld Finite Element Analysis Credit Hours: (3)
- BIOM 4110 Science of Medicine Credit Hours: (3)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- EECE 3201 Circuit Analysis II Credit Hours: (4)
- EECE 3203 Signals and Systems | Credit Hours: (3)
- EECE 3211 Electronics | Credit Hours: (3)
- EECE 3221 Matrix Computer Methods Credit Hours: (3)
- EECE 3240 Electromagnetic Field Theory Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- MATH 4391 Partial Differential Eqns | Credit Hours: (3)
- MATH 4721 Numerical Analysis Credit Hours: (3)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 3500 Micro I/Fundmntl Aspect Credit Hours: (3)
- BIOL 4380 Vertebrate Histology Credit Hours: (3)
- BIOL 4445 Immunology Credit Hours: (3)
- BIOL 4511 BIOCHEMISTRY | Credit Hours: (3)
- MECH 2311 Engineering Thermodynamics | Credit Hours: (3)
- MECH 3331 Fluid Mechanics Credit Hours: (3)
- MECH 3335 Fluid Mechanics Lab Credit Hours: (1)
- MECH 4324 Computer Methods in Design Credit Hours: (3)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- PHYS 3011 Methods of Theoretical Physics- | Credit Hours: (3)
- TECH 4472 Computer Aided Design Credit Hours: (3)

#### Policy on repeated courses:

Students must earn a grade of at least "C-" in all BIOM courses applied toward the major, and in all required engineering, chemistry, physics, biology, and mathematical courses. BIOM, BIOL, CHEM, MATH and PHYS courses applicable toward the major may not be taken more than three times.

Any BIOM course and in all required engineering, chemistry, physics, biology, and mathematical courses applicable toward the major may be repeated once to earn a minimum grade of "C-". To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available from one of the Academic Coordinators. A student may not attempt the same BIOM or any required engineering, chemistry, physics and mathematical courses more than three times, regardless of where it was taken. Courses cross-listed with BIOM (e.g. BIOL 4110, MECH 4365) are also subject to this course repetition policy.

#### **Residence Requirements:**

Biomedical Engineering requires that 12 of the last 60 hours required by the University for residency be taken as upper-division engineering courses in the Herff College of Engineering and, specifically, include BIOM 4760, BIOM 4782, and BIOM 4784.

82

## Typical 4-Year Biomedical Engineering Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- BIOM 1701 Introduction to Biomedical Engineering Design Credit Hours: (1)
- BIOM 1702 Biomedical Engineering Visualization Credit Hours: (1)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- BIOM 1720 Intro Biomed Engr Tools Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

### Academic Year Total 34 hrs

### Sophomore Year

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- BIOM 2720 Experimental Design Analysis Credit Hours: (3)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1) or
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- CIVL 2131 Statics Credit Hours: (3)
- EECE 2201 Circuit Analysis | Credit Hours: (3)
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1) or
- EECE 2283 Electrical Engr/Instrumntation Credit Hours: (3)
- EECE 2281 Instrumentation Lab Credit Hours: (1)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

### Academic Year Total 29 hrs

### Junior Year

- BIOM 3010 Medical Measurements Credit Hours: (4)
- ECON 2010 Intro to Macroeconomics\*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- BIOM 3110 Med Physiology/BIOM Credit Hours: (3) or
- BIOL 3730 Vertebrate Physiology Credit Hours: (4)
- Engineering Elective **Credit Hours:** (3)
- BIOM 4730 Biomaterials Credit Hours: (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- BIOM 3710 Physiological System/Modeling Credit Hours: (3)
- Technical Elective **Credit Hours:** (3)
- MECH 2320 Mechanics of Materials Credit Hours: (3) or
- MECH 2332 Dynamics Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3)

#### Academic Year Total 32-33 hrs

#### Senior Year

- BIOM 4760 Biomed Engr Design Principles Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3)\*\*
- BIOM Elective Credit Hours: (3)
- Technical Elective Credit Hours: (3)
- Engineering Elective **Credit Hours:** (3)
- BIOM Elective Credit Hours: (3)
- Engineering Elective **Credit Hours:** (3)
- Social/Behavioral Sciences Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3)\*\*
- BIOM 4782 Biomedical Design Practicum Credit Hours: (1)
- BIOM 4784 Biomedical Design Studio Credit Hours: (2)

#### Academic Year Total 30 hrs

### Total Hours Required for Graduation: 125-126

\*\*Must satisfy University General Education Program Requirement

### Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in an engineering program during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average and must submit two reference letters and a copy of their transcript to their respective engineering department. Each applicant will complete an interview with the graduate academic coordinator in their respective engineering department.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

84

Only in ABM programs, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## **Business Economics - Financial Economics Concentration, (B.B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

### Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)

- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

### The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

# For students choosing the Business Economics major with a concentration in Financial Economics:

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- three upper-division economics courses (9 hours)
- three upper-division FIR courses (9 hours) selected with the approval of the department advisor.

### Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

### Typical 4 Year Sequence Economics Major: Financial Economics Concentration

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

- Elective (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science with lab (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science with lab (4) \*
- History (3) \*
- Humanities/Fine Arts (3) \*
- Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- ECON elective (3)
- History (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

- ECON elective (3)
- Finance elective (3)
- Finance elective (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- ECON elective (3)

- Finance elective (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 30 hrs

## **Business Economics, (B.B.A.)**

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

### Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

### Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)

- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

### For students choosing the Business Economics major with no concentration:

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- six upper-division economics courses (18 hours) selected with the approval of the department advisor.

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

## Typical 4-Year Business Economics Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Humanities/Fine Arts (3) \*
- Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- ECON elective (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- ECON elective (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

- ECON elective (3)
- ECON elective (3)
- Elective (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- ECON elective (3)
- ECON elective (3)

- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- History (3) \*

Semester Totals 30 hrs

### Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Business Information and Technology, (B.B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

### Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)

- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

## C. The Major (27 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

### Completion of a minimum of 27 hours, including

- MIS 2845 Applied Program Development I \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 3790 Enterprise Architecture \*\* Credit Hours: (3)
- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)
- MIS 4800 Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

### The additional nine hours will be satisfied by three of the following:

- MIS 4160 Mobile Application Development Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MIS 4672 Project Management Tools and Leadership \*\* Credit Hours: (3)
- MIS 4681 Fundamental/Software Testing Credit Hours: (3)
- MIS 4682 Advanced Software Testing Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- MIS 4845 Application Program Development III Credit Hours: (3)
- MIS 4911 Internship in Management Information Systems Credit Hours: (1-6)

## D. Electives (10 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

### Typical 4-Year Business Information and Technology

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

- History (3) \*
- Humanities/Fine Arts (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3) Take either
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- Elective (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3) Elective (3)
- MIS 2845 Applied Program Development I \*\* Credit Hours: (3)
- History (3) \*
- Natural Science (4) \*

#### Semester Totals 32 hrs

#### Junior Year

- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- Elective (1-3)
- MIS 3790 Enterprise Architecture \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Senior Year

- MIS major elective (3)
- MIS major elective (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- Elective (3)
- MIS major elective (3)

- MIS 4800 Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)

Semester Totals 30 hrs

### Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Chemistry - Biochemistry Concentration, (B.S.)**

Program objectives for a B.S. in Chemistry and a B.S.Ch. in Chemistry are: (a) to have a satisfactory knowledge and comprehension of core concepts of analytical, organic, physical, inorganic and bioorganic chemistry; (b) to develop the ability to critically assess and solve problems relating to theoretical and practical aspects of chemistry; (c) to have satisfactory laboratory skills; (d) to have satisfactory presentation skills to communicate chemical concepts and the results of investigations into chemical phenomena, through oral and written discourse and by way of mathematical sciences (e) to have satisfactory basic computer and computational skills; (f) will be satisfactorily prepared for entry level positions in the field, or for admission to graduate or professional school; (g) to demonstrate an understanding of professional ethics and the importance of chemistry in its impact on society.

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Chemistry, B.S. Major:

#### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

The Major (46-47 hours)

## **General Education (12 hours)**

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)

• CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

#### Core Requirements (31 hours):

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) or
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

#### Plus One of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

### **Biochemistry Concentration (22 hours)**

- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- CHEM 4511 Biochemistry | Credit Hours: (3)
- CHEM 4501 Lab Tech In Biochem Credit Hours: (2)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)

#### Plus one of the Following Courses:

- CHEM 4512 Biochemistry II Credit Hours: (3)
- BIOL 3500 Micro I/Fundmntl Aspect Credit Hours: (3)
- BIOL 3130 Cell Biology Credit Hours: (3)

and

• three (3) additional upper division hours in CHEM.

### NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grad e of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

95

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

### Electives

Electives must be chosen to bring the total number of hours to 120.

## Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- 1. In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- 2. The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- 3. The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- 4. The student must present his/her research to an audience external to the Department of Chemistry.

## Typical 4-Year Chemistry (B.S.) Sequence, Biochemistry Concentration

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3) or
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ACAD 1100 Academic Strategies Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1)
- Social/Behavioral Sci\* (3)

### Semester Totals 30-31 hrs

### Sophomore Year

- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)

- Humanities/Fine Arts\* (3)
- PHYS 2010 General Physics | Credit Hours: (3) SC
- PHYS 2011 General Physics Lab | Credit Hours: (1) SC
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- PHYS 2020 General Physics II Credit Hours: (3) SC
- PHYS 2021 General Physics Lab II Credit Hours: (1) SC
- Social/Behavioral Sciences\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- Elective (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- History\* (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- Elective (3)
- Ethics (3) (One of the following may be selected: PHIL 3512, PHIL 3514, PHIL 3515)
- History\* (3)
- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)

#### Semester Totals 29 hrs

#### Senior Year

- CHEM 4501 Lab Tech In Biochem Credit Hours: (2)
- CHEM 4511 Biochemistry | Credit Hours: (3)
- Elective (3)
- Elective (3)
- Elective (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- UD CHEM (3)
- UD BIOL (3) (Only one of BIOL 3130, BIOL 3500 or CHEM 4512 is required.)
- UD Elective (3)
- UD Elective (3)
- Elective (2)

#### Semester Totals 29 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

sc PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 may be substituted for this sequence

## Chemistry - Biochemistry Concentration, (B.S.Ch.)

The department also offers a program culminating in the professional degree of Bachelor of Science in Chemistry (B.S.Ch.). This program is designed to meet the requirements of the Committee on Professional Training of the American Chemical Society, and is undertaken primarily by students who desire to go directly to positions in the chemical industry, or to enroll for postgraduate study in chemistry.

## University General Education Program (41 hours)

See Graduation from the University link for the University General Education Program requirements.

To qualify for the Bachelor of Science in Chemistry degree, the student must complete a minimum of 120 semester hours with a grade point average of at least 2.0. A minimum of 42 semester hours must be in courses from the upper division.

Note: The following courses meet general education requirements as well as degree requirements for the B.S. Ch.

#### **Natural Science:**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### Mathematics:

 MATH 1910 - Calculus I \*\* Credit Hours: (4) (These courses must be successfully completed prior to enrolling in Core Requirement courses)

### The Major (64 hours)

#### General Education (12 hours) Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) Mathematics:
- MATH 1910 Calculus I \*\* Credit Hours: (4)

#### Core Requirements (35 hours)

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 4999 Senior Survey Credit Hours: (1)

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3) PS
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) PS
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

#### Plus one of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

#### **Biochemistry Concentration (13 hours)**

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- CHEM 4511 Biochemistry | Credit Hours: (3)
- CHEM 4501 Lab Tech In Biochem Credit Hours: (2)

#### **Additional Lectures and Lab**

Six (6) additional upper division hours in chemistry lecture courses, one additional upper division chemistry laboratory course and:

- CHEM 4901 Chemical Research | Credit Hours: (1)
- CHEM 4902 Chemical Research II Credit Hours: (1)
- CHEM 4903 Chemical Research III Credit Hours: (1)

#### Choose one of the Following 2 Courses:

- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- MATH 4635 Intro Probability Theory Credit Hours: (3)

Choose one of the Following 3 Courses:

- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 3500 Micro I/Fundmntl Aspect Credit Hours: (3)
- CHEM 4512 Biochemistry II Credit Hours: (3)

#### **Electives**

#### Electives must be chosen to bring the total number of hours to 120.

### Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- 1. In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- 2. The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- 3. The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- 4. The student must present his/her research to an audience external to the Department of Chemistry.

## Typical 4-year Chemistry (B.S.Ch. Biochemistry Concentration)

### Freshman Year

#### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ACAD 1100 Academic Strategies Credit Hours: (3)
- Humanities/Fine Arts (3) Semester Total: 17 hours

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1) Semester Total: 15 hours

### Freshman Year Totals: 32 hours

#### Sophomore Year

#### **First Semester**

- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3) PS
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) PS
- COMM 2381 Oral Communication \*\* Credit Hours: (3) Semester Total: 15 hours

#### Second Semester

- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) PS
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) PS
- Social/Behavioral Sciences (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Semester Total: 14 hours

### Sophomore Year Totals: 29 hours

### Junior Year

### **First Semester**

- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- MATH (3) (from MATH 4611 or MATH 4635)
- Humanities/Fine Arts (3)\*
- History (3)\* Semester Total: 14 hours

#### Second Semester

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- Social/Behavioral Science (3)\*
- Ethics (3) (one from PHIL 3512, PHIL 3514, PHIL 3515)
- History (3)\* Semester Total: 15 hours

### Junior Year Totals: 29 hours

### Senior Year

#### **First Semester**

- CHEM 4501 Lab Tech In Biochem Credit Hours: (2)
- CHEM 4511 Biochemistry | Credit Hours: (3)
- CHEM 4901 Chemical Research I Credit Hours: (1)
- CHEM 4902 Chemical Research II Credit Hours: (1)
- Elective (3)
- Elective (3)
- CHEM UD (3) Semester Total: 16 hours

### Second Semester

- CHEM 4903 Chemical Research III Credit Hours: (1)
- UD CHEM lab (1)
- CHEM UD (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- BIOL (3) (from BIOL 3130, BIOL 3500, or CHEM 4512)
- Elective (3)
- Elective(3)
   Semester Total: 15 hours

### Senior Year Totals: 31 hours

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010 / PHYS 2011 and PHYS 2020 / PHYS 2021 may be substituted for this sequence.

## **Chemistry - General Concentration, (B.S.)**

Program objectives for a B.S. in Chemistry and a B.S.Ch. in Chemistry are: (a) to have a satisfactory knowledge and comprehension of core concepts of analytical, organic, physical, inorganic and bioorganic chemistry; (b) to develop the ability to critically assess and solve problems relating to theoretical and practical aspects of chemistry; (c) to have satisfactory laboratory skills; (d) to have satisfactory presentation skills to communicate chemical concepts and the results of investigations into chemical phenomena, through oral and written discourse and by way of mathematical sciences (e) to have satisfactory basic computer and computational skills; (f) will be satisfactorily prepared for entry level positions in the field, or for admission to graduate or professional school; (g) to demonstrate an understanding of professional ethics and the importance of chemistry in its impact on society.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Chemistry, B.S. Major:

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

The Major (46-47 hours)

## **General Education (12 hours)**

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

### Core Requirements (31 hours):

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)

- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) or
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

#### Plus One of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

## General Concentration (15-16 hours)

Choose eight (8) upper division semester hours in chemistry from the following (not to include more than three credit hours of experiential learning):

- CHEM 4901 Chemical Research | Credit Hours: (1)
- CHEM 4902 Chemical Research II Credit Hours: (1)
- CHEM 4903 Chemical Research III Credit Hours: (1)
- CHEM 4916 Teaching Chemistry Credit Hours: (1-3)

#### and

• MATH 1920 - Calculus II\*\* Credit Hours: (4)

#### Plus one of the Following Courses:

- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)

### NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grade of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry Department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

### Electives

## Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- 1. In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- 2. The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- 3. The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- 4. The student must present his/her research to an audience external to the Department of Chemistry.

## Typical 4-Year Chemistry (B.S.) Sequence, General Concentration

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Humanities/Fine Arts\* (3)
- ACAD 1100 Academic Strategies Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- Social/Behavioral Sci\* (3)

#### Semester Totals 31 hrs

#### Sophomore Year

- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) PS
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) PS
- Social/Behavioral Science\* (3)

• Elective (3)

#### Semester Totals 31 hrs

#### Junior Year

- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- MATH (3) (select from: MATH 2110, MATH 4611 OR COMP 1900)
- History\* (3)
- Elective (3)
- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- PHIL 351X (3) (select from: PHIL 3512, 3514 OR 3515)
- History\* (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- Elective (3)

#### Semester Totals 29 hrs

### Senior Year

- UD CHEM (4)
- Elective (3)
- Elective (2)
- UD elective (3)
- UD CHEM (4)
- CHEM 4999 Senior Survey Credit Hours: (1)
- UD elective (3)
- UD Elective (3)
- UD elective (3)
- Elective (3)

Semester Totals 29 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011 and PHYS 2020/PHYS 2021 may be substituted for this sequence.

## **Chemistry - General Concentration, (B.S.Ch.)**

105 The department offers a program culminating in the professional degree of Bachelor of Science in Chemistry (B.S.Ch.). This program is designed to meet the requirements of the Committee on Professional Training of the American Chemical Society, and is undertaken primarily by students who desire to go directly to positions in the chemical industry, or to enroll for postgraduate study in chemistry.

## University General Education Program (41 hours)

See Graduation from the University link for the University General Education Program requirements.

To qualify for the Bachelor of Science in Chemistry degree, the student must complete a minimum of 120 semester hours with a grade point average of at least 2.0. A minimum of 42 semester hours must be in courses from the upper division.

Note: The following courses meet general education requirements as well as degree requirements for the B.S. Ch.

#### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (These courses must be successfully completed prior to enrolling in Core Requirement courses)

### The Major (64-66 hours)

## **General Education (12 hours)**

#### **Natural Science:**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) Mathematics:
- MATH 1910 Calculus I \*\* Credit Hours: (4)

#### Core Requirements (35 hours):

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 4999 Senior Survey Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3) PS
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) PS
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) (strongly recommended)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

#### Plus one of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

### Advanced Requirements (17-19 hours)

Nine (9 hrs) upper division semester in chemistry lecture courses, plus (2-3 hrs) in upper division chemistry laboratory courses, the undergraduate research course sequence (3 hrs) CHEM 4901/CHEM 4902/CHEM 4903

#### Plus one of the following courses (3-4 hrs):

- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- MATH 4635 Intro Probability Theory Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)

#### Electives

#### Electives must be chosen to bring the total number of hours to 120.

### Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- 1. In order to graduate with Honors in Chemistry, the student must have an inclusive GPA of at least 3.25 and a cumulative GPA of at least 3.25 in all science and mathematics courses required for the major.
- 2. The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- 3. The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- 4. The student must present his/her research to an audience external to the Department of Chemistry.

### Typical 4-Year Chemistry (B.S.Ch.) Sequence

### Freshman Year

#### First Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ACAD 1100 Academic Strategies Credit Hours: (3)
- Humanities/Fine Arts (3)

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

Social/Behavioral Sci (3) \*

### Semester Totals 31 hrs

### Sophomore Year

#### First Semester

- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- Elective (3)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3) PS or
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1) PS
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

#### Second Semester

- Social/Behavioral Sci (3) \*
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) PS
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) PS
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Elective (3)

### Semester Totals 31 hrs

### Junior Year

### First Semester

- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- MATH (3) (from MATH 2110, MATH 2120, MATH 4611, MATH 4635 or COMP 1900)
- Humanities/Fine Arts (3) \*
- History (3) \*

### Second Semester

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- Elective (3)
- Ethics (3) (One of the following may be selected: PHIL 3512, PHIL 3514, PHIL 3515)
- History (3) \*

### Semester Totals 29 hrs

### Senior Year

**First Semester** 

- CHEM 4902 Chemical Research II Credit Hours: (1)
- UD CHEM lab (1)
- UD CHEM (3)
- CHEM 4901 Chemical Research | Credit Hours: (1)
- Elective (3)
- Elective (3)
- CHEM UD (3)

#### Second Semester

- CHEM 4903 Chemical Research III Credit Hours: (1)
- UD CHEM lab (1)
- UD CHEM (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- UD elective (3)
- UD Elective (3)
- Elective (2)

#### Semester Totals 29 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011 and PHYS 2020/PHYS 2021 may be substituted for this sequence.

## Civil Engineering, (B.S.C.E.)

### Graduation

To qualify for the degree of Bachelor of Science in Civil Engineering, a student must satisfy general university and college requirements, have a minimum grade of "C-" in all engineering, science, and mathematics courses that are applied toward the degree, and complete the Course Sequence. For credits transferred from another institution, only those civil engineering, science, and mathematics courses with a minimum grade of "C-" may be applied toward the degree. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

## Honors Program

Students are eligible for the honors program in Civil Engineering if they have a minimum overall GPA of 3.25 with a Junior or Senior standing or have received approval of the departmental honors committee. The honors program in Civil Engineering requires 9 hours of upper division honors courses. Those students who complete the program and the regular B.S.C.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Civil Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Civil Engineering.

## University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

## Communication

• ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

### Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

## Natural Science

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)

## History

Waived for B.S.C.E. students who have completed one unit of American history in high school.

## College and Degree Requirements (22 hours)

## Mathematics

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

## **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)

Physical Science 1 (One of the Following):

- BIOL 1110 General Biology | Credit Hours: (3) and
- BIOL 1111 General Biology | Lab Credit Hours: (1) or
- ESCI 1040 Physical Geology Credit Hours: (4) or
- ESCI 1103 The Human Planet Credit Hours: (4)

### Physical Science 2 (One of the Following):

- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) and
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) or
- CHEM 1120 General Chemistry II Credit Hours: (3) and
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or

- BIOL 1120 General Biology II Credit Hours: (3) and
- BIOL 1121 General Biol II Lab Credit Hours: (1)

## **Collateral Courses**

- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- MECH 2332 Dynamics Credit Hours: (3)

## The Major (67 hours)

## Completion of

- CIVL 1101 Civil Engr Measurements Credit Hours: (3)
- CIVL 1112 Civil Engr Analysis Credit Hours: (3)
- CIVL 2101 Civil Engr Visualization Credit Hours: (3)
- CIVL 2107 Civil Engr Computation Credit Hours: (3)
- CIVL 2131 Statics Credit Hours: (3)
- CIVL 3103 Approx/Uncertainty in Engr Credit Hours: (3)
- CIVL 3121 Structural Analysis | Credit Hours: (3)
- CIVL 3131 Design of Steel Structures Credit Hours: (3) or
- CIVL 4135 Reinforced Concrete Design Credit Hours: (3)
- CIVL 3137 Civil Engr Materials Credit Hours: (3)
- CIVL 3140 Environmental Systems Engineering Credit Hours: (4)
- CIVL 4151 Soil Mechanics Credit Hours: (4)
- CIVL 3161 Transportation Systems Engineering Credit Hours: (3)
- CIVL 3180 Civil Engr Hydraulics Credit Hours: (3)
- CIVL 3181 Hydraulics and Hydrology Credit Hours: (3)
- CIVL 3182 Hydraulics and Hydrology Lab Credit Hours: (1)
- CIVL 3322 Mechanics of Materials Credit Hours: (3)
- CIVL 3325 Mechanics of Materials Lab Credit Hours: (1)
- CIVL 4111 Engineering Economics Credit Hours: (3)
- CIVL 4195 Professional Practice/Civil En Credit Hours: (3)
- CIVL 4197 Review/Engineering Fundamental Credit Hours: (0)
- CIVL 4199 Civil Engr Design Credit Hours: (3)

## **Civil Engineering Electives**

Nine hours of civil engineering electives approved by an advisor.

- CIVL 4122 Structural Analysis II Credit Hours: (3)
- CIVL 4131 Intermediate Steel Design Credit Hours: (3)
- CIVL 4135 Reinforced Concrete Design Credit Hours: (3) or
- CIVL 3131 Design of Steel Structures Credit Hours: (3)
- CIVL 4136 Inter Reinforced Concrete Dsgn Credit Hours: (3)
- CIVL 4140 Environmental Engr Design Credit Hours: (3)
- CIVL 4143 Physical/Chemical Treatment Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- CIVL 4144 Biological Wastewater Treatmnt Credit Hours: (3)
- CIVL 4149 Pump Station Design Credit Hours: (3)
- CIVL 4152 Applied Soil Mechanics Credit Hours: (3)
- CIVL 4155 Pavement Design and Evaluation Credit Hours: (3)
- CIVL 4162 Traffic Engineering Credit Hours: (3)
- CIVL 4163 Airport Planning and Design Credit Hours: (3)
- CIVL 4164 Route Location and Design Credit Hours: (3)
- CIVL 4171 Construction Engineering Credit Hours: (3)
- CIVL 4180 Adv Hydrology/Hydraulics Credit Hours: (3)
- CIVL 4190 Water Resources Planning and Management Credit Hours: (3)
- CIVL 4191 Civil Engr Project Credit Hours: (1-3)
- CIVL 4211 Physical Hydrology Credit Hours: (4)
- CIVL 4900-4910 Special Topics in Civil Engineering Credit Hours: (1-3)

## Concentrations

A student may select courses from the following concentrations to satisfy civil engineering elective requirements. If the student declares a concentration, a minimum of 9 hours from that concentration area is required.

#### **Construction Engineering**

- CIVL 4164 Route Location and Design Credit Hours: (3)
- CIVL 4171 Construction Engineering Credit Hours: (3)
- CIVL 4191 Civil Engr Project Credit Hours: (1-3) Environmental Engineering
- CIVL 4140 Environmental Engr Design Credit Hours: (3)
- CIVL 4143 Physical/Chemical Treatment Credit Hours: (3)
- CIVL 4144 Biological Wastewater Treatmnt Credit Hours: (3)
- CIVL 4149 Pump Station Design Credit Hours: (3)
- CIVL 4180 Adv Hydrology/Hydraulics Credit Hours: (3)
- CIVL 4191 Civil Engr Project Geotechnical Engineering
- CIVL 4152 Applied Soil Mechanics Credit Hours: (3)
- CIVL 4155 Pavement Design and Evaluation Credit Hours: (3)
- CIVL 4171 Construction Engineering
- CIVL 4191 Civil Engr Project Structural Engineering
- CIVL 4131 Intermediate Steel Design Credit Hours: (3)
- CIVL 4135 Reinforced Concrete Design Credit Hours: (3) or
- CIVL 3131 Design of Steel Structures Credit Hours: (3)
- CIVL 4136 Inter Reinforced Concrete Dsgn Credit Hours: (3)
- CIVL 4152 Applied Soil Mechanics
- CIVL 4191 Civil Engr Project
- CIVL 4122 Structural Analysis II Credit Hours: (3) Transportation Engineering
- CIVL 4155 Pavement Design and Evaluation
- CIVL 4162 Traffic Engineering Credit Hours: (3)
- CIVL 4163 Airport Planning and Design Credit Hours: (3)
- CIVL 4164 Route Location and Design
- CIVL 4191 Civil Engr Project

## Typical 4-Year Civil Engineering Sequence

## Freshman Year

#### Fall Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- CIVL 1101 Civil Engr Measurements Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3) Total Hours: 17

#### Spring Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- CIVL 1112 Civil Engr Analysis Credit Hours: (3)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- Physical Science 1 Credit Hours: (4)
- BIOL 1110 General Biology | Credit Hours: (3) and
- BIOL 1111 General Biology | Lab Credit Hours: (1) or
- ESCI 1040 Physical Geology Credit Hours: (4) or
- ESCI 1103 The Human Planet Credit Hours: (4) Total Hours: 18

### Academic Year Total 35 hrs

### Sophomore Year

#### Fall Semester

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- Physical Science 2 Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) and
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) or
- CHEM 1120 General Chemistry II Credit Hours: (3) and
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or
- BIOL 1120 General Biology II Credit Hours: (3) and
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- CIVL 2101 Civil Engr Visualization Credit Hours: (3)
- CIVL 2131 Statics Credit Hours: (3) Total Hours: 17

Spring Semester

- CIVL 2107 Civil Engr Computation Credit Hours: (3)
- Social/Behavioral Sciences Credit Hours: (3)\*
- Humanities/Fine Arts Credit Hours: (3)\*
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MECH 2332 Dynamics Credit Hours: (3)
- CIVL 3322 Mechanics of Materials Credit Hours: (3) Total Hours: 18

### Academic Year Total 35 hrs

### Junior Year

#### Fall Semester

- CIVL 3137 Civil Engr Materials Credit Hours: (3)
- CIVL 3325 Mechanics of Materials Lab Credit Hours: (1)
- CIVL 3180 Civil Engr Hydraulics Credit Hours: (3)
- CIVL 3121 Structural Analysis | Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3)\*
- CIVL 3103 Approx/Uncertainty in Engr Credit Hours: (3) Total Hours: 16

#### Spring Semester

- CIVL 3131 Design of Steel Structures Credit Hours: (3) or
- CIVL 4135 Reinforced Concrete Design Credit Hours: (3)
- CIVL 3161 Transportation Systems Engineering Credit Hours: (3)
- CIVL 3140 Environmental Systems Engineering Credit Hours: (4)
- CIVL 4151 Soil Mechanics Credit Hours: (4)
- CIVL 3182 Hydraulics and Hydrology Lab Credit Hours: (1) Total Hours: 15

### Academic Year Total 31 hrs

### Senior Year

#### **Fall Semester**

- CIVL 3181 Hydraulics and Hydrology Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3)
- CIVL 4111 Engineering Economics Credit Hours: (3)
- CIVL 4195 Professional Practice/Civil En Credit Hours: (3)
- CIVL 4197 Review/Engineering Fundamental Credit Hours: (0)
- CIVL Elective Credit Hours: (3) Total Hours: 15

#### Spring Semester

- CIVL 4199 Civil Engr Design Credit Hours: (3)
- Social/Behavioral Sciences Credit Hours: (3)\*
- CIVL Elective **Credit Hours:** (3)
- CIVL Elective Credit Hours: (3) Total Hours: 12

## Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

# Accelerated B.S.C.E./M.S. Program in Civil Engineering

This program allows outstanding undergraduates to earn a Bachelor's degree and Master's degree in Civil Engineering in as little as five years by taking graduate-level technical electives that will count toward both degree programs. Specifically, students who are selected into this program can satisfy the undergraduate requirement of nine hours of technical electives by taking 6000-level courses that will then be counted toward their graduate degree program. However, the graduate coursework will not apply to the undergraduate GPA.

Students are encouraged to begin planning to enter the Accelerated B.S.C.E/M.S. program early in their undergraduate career in consultation with their advisor in the Department of Civil Engineering. Students with a minimum GPA of 3.25 may apply for the accelerated program once they have completed 15 credit hours of 3000-level CIVL coursework.

In addition to an application form, students must have the recommendation of their undergraduate academic advisor, and the concurrence of the department chair and graduate coordinator in the Department of Civil Engineering. In order to remain in the program, students must maintain a GPA of at least 3.25. To continue in the program past the B.S.C.E. degree, students must apply for full admission into the Graduate School and the Civil Engineering M.S. program.

# **Commercial Aviation, (B.S.)**

The degree program in Commercial Aviation prepares persons for careers as airline pilots, or in a variety of aviation-related fields, such as corporate aviation, general aviation, aviation-related business, airport operations, and governmental regulation of aviation. It does so by offering studies in aviation, management, business operations, human resources, transportation, logistics and aviation administration. These studies are combined with flight labs, experiential learning, and internships in an aviation setting. Aviation training is provided by professional aviation instruction certified by the Federal Aviation Administration.

**Note:** Aviation students must have a Valid Class A FAA Aviation Medical Certificate conducted by an FAA medical examiner. The exam usually costs about \$120 and lasts 5 years. This should be completed no later than the student's first flight. A background check is also required.

For information on careers in this and other disciplines students should consult the career counselor located in 211 Wilder Tower, 678-2068.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

## Major Field Core (64 hours)

### Management and Business Operations (6 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)

### Human Resources, Staffing and Development (6 hours)

### Choose One:

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4260 Employee Staffing/Training/Development \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- LDSP 3000 Leadership Development\*\* Credit Hours: (3)
- BMGT 3630 Human Resource Mgmt\*\* Credit Hours: (3)

### Choose One:

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- PSYC 3508 Indust/Organizatnl Psyc Credit Hours: (3)
- COMM 3010 Integrated Corp Comm\*\* Credit Hours: (3)
- PM 4120 Organization Theory and Behav\*\* Credit Hours: (3)

## Professional Aviation (52 hours)

#### Prerequisites to the aviation program: Private Pilot Certificate

- AVIA 1700 Aviation Safety Credit Hours: (3)
- AVIA 1800 Systems I: Basic Aircraft Systems Credit Hours: (3)
- AVIA 2100 Aerodynamics Credit Hours: (3)
- AVIA 2101 Instrument/Commercial Flight Lab Credit Hours: (1)
- AVIA 2200 Instrument/Commercial Ground School Credit Hours: (3)
- AVIA 2300 Advanced Flight Lab Credit Hours: (1)
- AVIA 3200 Commercial Ground School Single Engine (ASEL) Credit Hours: (3)
- AVIA 3201 Commercial Flight Lab Single Engine (ASEL) Credit Hours: (1)
- AVIA 3300 Commercial Ground School Multi-Engine (AMEL) Credit Hours: (2)
- AVIA 3301 Commercial Flight Lab Multi-Eng Credit Hours: (1)
- AVIA 3400 Air Traffic Control and Airspace Credit Hours: (3)
- AVIA 3500 Systems II: Turbine Aircraft Credit Hours: (3)
- AVIA 4200 Systems III: Transport Category Aircraft Systems Credit Hours: (3)
- AVIA 4300 Air Carrier Operations Credit Hours: (3)
- AVIA 4700 Flight Instructor Ground School Credit Hours: (4)
- AVIA 4800 Human Factors & Crew Resource Management Credit Hours: (3)
- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 4216 Synoptic Meteorology Credit Hours: (3)

## **College Requirements**

## Thematic Studies (6 hours)

Students complete a total of 6 hours in a College of Professional & Liberal Studies thematic studies course(s). These courses are designed to broaden a student's knowledge of significant AVIA themes.

### AVIA Thematic Studies Course are the Following:

- AVIA 4550 Aviation Law & Regulation Credit Hours: (3)
- AVIA 4560 Aviation Physiology & Survival Credit Hours: (3)

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. For this concentration, the senior project is:

116

• AVIA 4701 - Flight Instructor Certification Credit Hours: (3)

## General Electives (11 – 17 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## Minimum Requirements for Graduation

• Students must complete at least 60 hours from a 4-year institution.• Students must complete at least 42 hours of upper-division credit (3000 or 4000-level).• Students must complete at least 30 of the last 60 hours through the University of Memphis.• Students must complete at least 9 graded hours in the major at the University of Memphis.

## **Communication, Communication Studies Concentration (B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (33-37 hours)

### Major Core (6 hours)

All students must take

- COMM 2100 Communication Inquiry \*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) (included in the University General Education Program)

#### Note

A 2.0 cumulative GPA and a grade no lower than a C- is required for all courses completed in the major. In addition, all students must fulfill the requirements for one of the following concentrations:

## Communication Studies (31 hours):

- COMM 2101 Media and Info Literacy \*\* Credit Hours: (3)
- COMM 3001 Rhetoric/Civic Controversy \*\* Credit Hours: (3)
- COMM 3100 Communication Ethics \*\* Credit Hours: (3)
- COMM 3330 Communication Research Methods \*\* Credit Hours: (4)
- COMM 4381 Senior Capstone \*\* Credit Hours: (3)

Plus Three Courses From One of the Following Focus Areas:

### Professional & Relational Communication

- COMM 3012 Health Communication \*\* Credit Hours: (3)
- COMM 3322 Theories of Persuasion \*\* Credit Hours: (3)
- COMM 3341 Discussion Credit Hours: (3)
- COMM 3561 Gender in Communication Credit Hours: (3)
- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4014 Communication on the Internet \*\* Credit Hours: (3)
- COMM 4015 Health Literacy Credit Hours: (3)
- COMM 4016 Public Health Campaigns Credit Hours: (3)
- COMM 4340 Listening Credit Hours: (3)
- COMM 4341 Interpersonal Communication \*\* Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4363 Dialogue Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COMM 4380 Communication and Conflict \*\* Credit Hours: (3)
- COMM 4400 Contemplative Communication Credit Hours: (3)

### Rhetoric & Public Advocacy

- COMM 3321 Argumentation and Advocacy \*\* Credit Hours: (3)
- COMM 3322 Theories of Persuasion \*\* Credit Hours: (3)
- COMM 3341 Discussion Credit Hours: (3)
- COMM 3561 Gender in Communication Credit Hours: (3)
- COMM 3360 Rhetoric of Pop Culture Credit Hours: (3)
- COMM 3361 African-American Rhetoric \*\* Credit Hours: (3)
- COMM 4013 Political Communication Credit Hours: (3)
- COMM 4340 Listening Credit Hours: (3)
- COMM 4360 American Eloquence Credit Hours: (3)
- COMM 4364 Gendered Public Discourse Credit Hours: (3)
- COMM 4365 Place/Community/Communication Credit Hours: (3)
- COMM 4380 Communication and Conflict \*\* Credit Hours: (3)
- COMM 4400 Contemplative Communication Credit Hours: (3)

### Media & Culture

- COMM 1851 Introduction to Film\*\* Credit Hours: (3)
- COMM 3003 Television and Culture\*\* Credit Hours: (3)
- COMM 3322 Theories of Persuasion \*\* Credit Hours: (3)
- COMM 3360 Rhetoric of Pop Culture Credit Hours: (3)
- COMM 3800 Media Industries Credit Hours: (3)
- COMM 3820 Broadcast Prep and Performance Credit Hours: (3)
- COMM 3821 Audio Narratives Credit Hours: (3)
- COMM 4014 Communication on the Internet \*\* Credit Hours: (3)
- COMM 4811 Media 2.0 Credit Hours: (3)
- COMM 4850 Film History | Credit Hours: (3)
- COMM 4851 Film History II Credit Hours: (3)
- COMM 4853 Documentary Form Film Credit Hours: (3)
- COMM 4854 Documentary Form Broadcasting Credit Hours: (3)
- COMM 4856 Gender and Film Credit Hours: (3)
- COMM 4858 Contemporary Cinema Credit Hours: (3)

- COMM 4859 Monster Films Credit Hours: (3)
- COMM 4860 Reality TV \*\* Credit Hours: (3)
- COMM 4861 Science Fiction Film Credit Hours: (3)

## Plus 6 Additional Hours of Comm Electives

## Electives (12 - 20 hours)

Completion of courses to bring the total to 120 semester hours.

## Honors Program

To be eligible for admission to the Communication Honors program a student must meet the following requirements: (1) declare a major in Communication, (2) have completed 12 hours of Communication coursework, (3) have Department of Communication faculty member as an adviser, and (4) make an honors application to the adviser. Applications may be obtained from the director of the honors program or from the department office.

To be awarded departmental honors at graduation with the designation "With Honors in Communication," a student must fulfill the following requirements: (1) maintain a 3.5 GPA in communication coursework, (2) maintain a 3.5 GPA overall, (3) complete all Department of Communication major requirements, (4) complete an independent thesis or an independent film/video project sponsored by a Department of Communication faculty member consisting of six hours over two semesters: three hours in research preparation (COMM 3330, COMM 4381, or COMM 4891), and three hours in completing the thesis project (COMM 4999), and (5) successful defense of the thesis.

## Typical 4-Year Communication Studies Concentration Sequence

## Freshman Year

- COMM 2100 Communication Inquiry \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Math\* (3-4)
- Foreign Language/B.A. (or elective)\*\* (3)
- Social/Behavioral Science (3)\*
- COMM 2101 Media and Info Literacy \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- Foreign Language/B.A. (or elective)\*\* (3)
- Social/Behavioral Science (3)\*

### Semester Totals 30-31 hrs

### Sophomore Year

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- Foreign Language/B.A. (3)
- Natural Science (4)\*
- History\* (3)
- COMM 3001 Rhetoric/Civic Controversy \*\* Credit Hours: (3)
- COMM 1851 Introduction to Film\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)

- Natural Science (4)\*
- History\* (3)

### Semester Totals 32 hrs

### Junior Year

- COMM 3100 Communication Ethics \*\* Credit Hours: (3)
- COMM Focus Area Course 1 (3)
- COMM elective (3)
- UD elective (3)
- Elective (3)
- COMM 3330 Communication Research Methods \*\* Credit Hours: (4)
- COMM Focus Area Course 2 (3)
- UD Elective (3)
- UD Elective (3)
- Elective (3)

### Semester Totals 31 hrs

## Senior Year

- COMM Focus Area Course 3 (3)
- UD COMM Elective (3)
- UD Elective (3)
- UD Elective (3)
- Elective (3)
- COMM 4381 Senior Capstone \*\* Credit Hours: (3)
- UD COMM Elective (3)
- Elective (3)
- Elective (3)

Semester Totals 27 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\* Must satisfy University General Education Program Requirement

# **Computer Engineering, (B.S.CP.E.)**

## Graduation

The minimum requirements for the degree of Bachelor of Science in Computer Engineering are given below. The student must satisfy university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010, MATH 1910, MATH 1920, MATH 2120, a Natural Science Elective, COMP 2150, COMP 2700, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121, or any equivalents to The online catalog can be accessed at: http://catalog.memphis.edu/index.php

these courses used to satisfy degree requirements. No transfer credit with a grade less than a minimum grade of "C" may be used to satisfy a requirement for the Bachelor of Science in Computer Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

120

#### Second Major in Mathematical Sciences

With minimal additional course work, Electrical and Computer Engineering majors are eligible for a Second Major in Mathematical Sciences. See the catalog for Mathematical Sciences.

## Honors Program

Students are eligible for the honors program in Computer Engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Computer Engineering requires a minimum of 8 hours of honors courses in Computer Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.CP.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Computer Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

## Minors:

Students satisfying the requirements for the Bachelor of Science in Computer Engineering may also satisfy requirements for a minor offered by a department in one of the other colleges. Requirements for a minor are specified by the appropriate college and department. Students should submit application for the minor to the appropriate department chair. Candidates for graduation who satisfy requirements for a minor should file the approved application with the intent-to-graduate cards.

# University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

### Communication

• ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

### **Mathematics**

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

### **Natural Science**

- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

### History

## College and Degree Requirements (21 hours)

## Mathematics (14 hours)

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- COMP 2700 Discrete Structures Credit Hours: (4)

## Natural Science (4 hours)

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) or
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1) or
- ESCI 1040 Physical Geology Credit Hours: (4)

## Collateral Course (3 hours)

• ENGR 1010 - Engineering Problem Solving Credit Hours: (3)

## The Major (65 hours)

## Major Core (59 hours)

Completion of the following:

- EECE 1208 Intro EECE Lab Credit Hours: (1)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- EECE 2201 Circuit Analysis | Credit Hours: (3)
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1)
- EECE 2207 Engineering Math Applications Credit Hours: (3)
- EECE 2222 Digital Circuit Design Credit Hours: (4)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 4270 Operating Systems Credit Hours: (3)
- EECE 3201 Circuit Analysis II Credit Hours: (4)
- EECE 3203 Signals and Systems | Credit Hours: (3)
- EECE 3204 Signals and Systems II Credit Hours: (3)
- EECE 3211 Electronics | Credit Hours: (3)
- EECE 3213 Electrical and Computer Engineering Lab 2 Credit Hours: (1)
- EECE 3270 Intro to Microprocessor Credit Hours: (4)
- EECE 4081 Software Engineering Credit Hours: (3)
- EECE 4235 Probabilistic System Analysis Credit Hours: (3)
- EECE 4278 Computer Organization Credit Hours: (3)
- EECE 4279 Professional Development Credit Hours: (3)
- EECE 4280 Electricl/Computer Engr Design Credit Hours: (3)
- EECE 4991 Electrical/Computer Projects | Credit Hours: (3)

## Electives (6 hours)

#### Computer Engineering electives from:

- EECE 4222 Digital Logic/Computer Design Credit Hours: (3)
- EECE 4277 DSP Microprocessors Credit Hours: (4)
- EECE 4710 Computer Architecture Credit Hours: (3)
- EECE 4711 Fault Tolerant Computer Des Credit Hours: (3)
- EECE 4712 Embedded Systems Credit Hours: (3)
- EECE 4272 Engineering Software Credit Hours: (3)
- EECE 4273 Database Engineering Credit Hours: (3)
- EECE 4275 Network Programming Credit Hours: (3)
- EECE 4276 Adv Network Programming Credit Hours: (3)
- EECE 4720 Intro Artificial Intelligence Credit Hours: (3)
- EECE 4730 Expert Systems Credit Hours: (3)
- EECE 4731 Data Visualization Credit Hours: (3)
- EECE 4741 Intro to Neurocomputing Credit Hours: (3)

## Typical 4-Year Computer Engineering Sequence

### **Freshman Year**

#### Fall Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- EECE 1208 Intro EECE Lab Credit Hours: (1)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- Humanities/Fine Arts\* Credit Hours: (3) Total Hours: 14

#### **Spring Semester**

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) Total Hours: 15

#### Academic Year Total 29 hrs

### Sophomore Year

#### Fall Semester

- EECE 2201 Circuit Analysis | Credit Hours: (3)
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1)
- EECE 2207 Engineering Math Applications Credit Hours: (3)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4) Total Hours: 15

#### Spring Semester

- EECE 2222 Digital Circuit Design Credit Hours: (4)
- EECE 3201 Circuit Analysis II Credit Hours: (4)

- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) Total Hours: 15

Academic Year Total 30 hrs

### Junior Year

#### Fall Semester

- EECE 3211 Electronics | Credit Hours: (3)
- EECE 3213 Electrical and Computer Engineering Lab 2 Credit Hours: (1)
- EECE 3203 Signals and Systems | Credit Hours: (3)
- Natural Science Elective Credit Hours: (4)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) or
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)
   or
- ESCI 1040 Physical Geology Credit Hours: (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3) Total Hours: 17

#### Spring Semester

- EECE 3204 Signals and Systems II Credit Hours: (3)
- EECE 3270 Intro to Microprocessor Credit Hours: (4)
- EECE 4235 Probabilistic System Analysis Credit Hours: (3)
- EECE 4991 Electrical/Computer Projects | Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3) Total Hours: 16

### Academic Year Total 33 hrs

### Senior Year

#### **Fall Semester**

- EECE 4278 Computer Organization Credit Hours: (3)
- Computer Engineering Elective **Credit Hours:** (3)
- ECON 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- EECE 4081 Software Engineering Credit Hours: (3)
- EECE 4279 Professional Development Credit Hours: (3) Total Hours: 15

#### Spring Semester

- EECE 4280 Electricl/Computer Engr Design Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- Computer Engineering Elective Credit Hours: (3)
- Humanities/Fine Arts\* Credit Hours: (3)

#### • Social/Behavioral Sciences\* Credit Hours: (3) Total Hours: 15

### Academic Year Total 30 hrs

## Total Hours Required for Graduation: 122

\*Must satisfy University General Education Program Requirement.

## Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Electrical or Computer Engineering during their senior year. Students are encouraged to begin planning to enter the Accelerated BS/MS program early in their undergraduate career, in consultation with their advisor in the Department of Electrical and Computer Engineering. Working with the undergraduate and graduate academic coordinators, undergraduates, who are selected into this program, may register for and substitute graduate level courses for undergraduate EECE electives or take and substitute cross-listed graduate versions of required undergraduate courses. This will allow the student to complete their BS degree while also beginning the coursework necessary to meet their MS degree requirement. However, any graduate coursework will not apply to the undergraduate GPA.

Students may apply for the program once they have completed one semester of junior course work. In order to remain in the program past the junior year, students must maintain a GPA of at least 3.25. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To continue in the program past the BS, students must apply for full admission into the Graduate School and either the Electrical or Computer Engineering MS program during their senior year. Students that are eligible for the ABM program will have the GRE requirement waived.

# **Computer Science, Artificial Intelligence Concentration (B.S.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

## The Major (63 hours)

#### **General Education (12 hours)**

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) and
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

or

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) and
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1) and
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)

#### **Core Requirement (51 hours)**

#### In addition to the specific General Education courses listed above, majors are required to take the following courses:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)

## Artificial Intelligence Concentration (12 hours)

- COMP 4118 Introduction to Data Mining Credit Hours: (3)
- COMP 4720 Intro Artificial Intelligence Credit Hours: (3)
- COMP 4730 Expert Systems Credit Hours: (3)
- COMP 4741 Intro to Neurocomputing Credit Hours: (3)

### Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

## Typical 4-Year Sequence for Artificial Intelligence Concentration

## Freshman Year

#### First Semester

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Free Elective (3)Total: 15 hrs.

Second Semester

- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Gen Ed Social Science (3) Total: 14 hrs.

### Sophomore Year

#### First Semester

- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- Natural Science I with Lab (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Total: 15 hrs.

#### Second Semester

- COMP 3115 Database Process and Design Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- Natural Science II with Lab (4)
- Gen. ed. history (3)
- Free Elective (3) *Total: 16 hrs.*

## Junior Year

#### First Semester

- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4720 Intro Artificial Intelligence Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Gen Ed Humanities (3) *Total: 15 hrs.*

#### Second Semester

- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4118 Introduction to Data Mining Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- Gen Ed Social Science (3)
- Free Elective (3)
  - Total: 15 hrs.

## Senior Year

#### First Semester

- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- Gen ed history (3)
- Free Elective (3)
- COMP 4741 Intro to Neurocomputing Credit Hours: (3) Total: 15 hrs.

Second Semester

- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)
- COMP 4730 Expert Systems Credit Hours: (3)
- Gen Ed Humanities (3)
- Free Elective (3) Total: 15 hrs.

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, Cybersecurity Concentration (B.S.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

## The Major (63 hours)

#### **General Education (12 hours)**

Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) and
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

or

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) and
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

or

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1) and
- BIOL 1120 General Biology II Credit Hours: (3)

• BIOL 1121 - General Biol II Lab Credit Hours: (1)

#### **Core Requirement (51 hours)**

In addition to the specific General Education courses listed above, majors are required to take the following courses:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)

## Cybersecurity Concentration (12 hours)

#### Completion of

- COMP 4410 Computer Security
- COMP 4420 Wireless and Mobile Security
- COMP 4430 Digital Forensics

and one COMP elective (3) which can be either COMP 4302 Web Service/Internet, or COMP 4310 Wireless Mobile Comp or COMP 4432 Secure Coding and Testing .

## Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

## Typical 4 Year Sequence Computer Science-Cybersecurity Concentration

### Freshman Year

#### First Semester

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Free elective (3) Total: 15

#### Second Semester

- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Gen ed social science (3) Total: 14

### Sophomore Year

#### **First Semester**

- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- Natural Science I w/lab (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Total: 15

#### Second Semester

- COMP 3115 Database Process and Design Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- Natural Science II w/lab (4)
- Gen ed history (3)
- Free elective (3) Total: 16

### Junior Year

First Semester

- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4410 Computer Security Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Gen ed humanities (3) Total: 15

#### Second Semester

- COMP 4270 Operating Systems Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- Gen ed social science (3)
- Free elective (3)
  - Total: 15

### Senior Year

#### First Semester

- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4430 Digital Forensics Credit Hours: 3
- Gen ed history (3)
- Free elective (3) Total: 15

#### Second Semester

- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)
- Cybersecurity elective (3)
- Gen ed humanities (3)

• Free elective (3) Total: 15

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, Data Science Concentration (B.S.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

#### **General Education (12 hours)**

Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) and
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

or

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) and
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

or

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1) and
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)

#### **Core Requirement (51 hours)**

In addition to the specific General Education courses listed above, majors are required to take the following courses:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- MATH 4614 Probability/Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)

## Data Science Concentration (12 hours)

Completion of

- COMP 4151 Intro to Data Science
- COMP 4745 Intro to Machine Learning
- MATH 4685 Statistical Learning I
- MATH 4686 Statistical Learning II

## Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

## Typical 4-Year Sequence for Data Science Concentration

### **Freshman Year**

First Semester

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Free Elective (3) Total hrs. 15

#### Second Semester

- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Gen Ed Social Science (3) Total hrs. 14

### Sophomore Year

**First Semester** 

- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- Natural Science I with Lab (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Total hrs. 15

#### Second Semester

- COMP 3115 Database Process and Design Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- Natural Science II with Lab (4)
- General Ed History (3)
- Free Elective (3)Total hrs 16

### Junior Year

First Semester

- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4151 Intro to Data Science Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Gen Ed Humanities (3) Total hrs. 15

#### Second Semester

- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4745 Intro to Machine Learning Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- Gen Ed Social Science (3)
- Free Elective (3)
   Total hrs. 15

### Senior Year

**First Semester** 

- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- MATH 4685 Statistical Learning | Credit Hours: (3)
- Gen Ed history (3)
- Free elective (3)
  - Total hrs 15

#### Second Semester

- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)
- MATH 4686 Statistical Learning II Credit Hours: (3)
- Gen Ed humanities (3)
- Free elective (3) Total hrs 15

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, General Concentration (B.S.)**

The Department of Computer Science offers courses leading to a B.S. degree with a major in computer science with an optional concentration in either cybersecurity, data science, or artificial intelligence. The department also offers a minor in computer science. Our B.S. degree program is accredited by the Computing Accreditation Commission of the Accreditation Board for Engineering and Technology (CAC/ABET).

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

#### **General Education (12 hours)**

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1) and
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

or

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) and
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

or

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1) and
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)

#### **Core Requirement (51 hours)**

#### In addition to the specific General Education courses listed above, majors are required to take the following courses:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)

## General Concentration (12 hours)

Completion of four upper-division COMP electives, which may not be any of 1000, 1100, 1800, 3050, 4001, or 4014

Note: Seniors are required to take the Computer Science Field Test the last semester before they graduate.

## Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

## **Computer Science Honors Designation**

A student will earn the designation "with Honors in Computer Science" upon graduation having complied with the following requirements:

- 1. Be admitted into the Computer Science Honors Program by the Department upon formal request for consideration by the student;
- 2. Have a cumulative GPA of at least 3.0 and a GPA of at least 3.60 in Computer Science (COMP) courses satisfying degree requirements;
- 3. Complete fifteen (15) credit hours in courses designated "Honors" in the the Computer Science program and satisfying degree requirements;
- 4. Take honors sections of both COMP 1900 and COMP 2150 (core sequence);
- Take at least three (3) credit hours from the following courses as honors sections: COMP 4882 Capstone Project, COMP 4901 Independent Study, COMP 4980 Senior Thesis.

## Typical 4 Year Sequence Computer Science-General Concentration

### Freshman Year

#### **First Semester**

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Free elective (3) Total: 15

#### Second Semester

- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Gen ed social science (3) Total: 14

### Sophomore Year

#### **First Semester**

- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- GE Natural Science I w/lab (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Credits / Units: 3 Total: 15

#### Second Semester

- COMP 3115 Database Process and Design Credit Hours: (3)
- MATH 4614 Probability/Statistics Credit Hours: (3)
- Free Elective (3)
- Gen Ed History (3)
- Natural Science II w/lab (4) Total: 16

### Junior Year

#### First Semester

- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Gen Ed Humanities (3) Total: 15

#### Second Semester

- COMP 4270 Operating Systems Credit Hours: (3)
- COMP Elective (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- GE Social Science (3)
- Free Elective (3)
- Total: 15

### Senior Year

#### First Semester

- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP Elective (3)
- Gen ed history (3)
- Free elective (3) Total: 15

#### Second Semester

- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)
- COMP Elective (3)
- Gen ed humanities (3)

• Free elective (3) Total: 15

## Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Criminology and Criminal Justice, (B.A.)

Program objectives for a B.A. in Criminology and Criminal Justice are: (a) exhibit an understanding of the important functions, organization, and fundamental concepts of the operation of the criminal justice system (police, law/courts, corrections) in a democratic society; (b) acquire knowledge of the development of the components of the criminal justice system from an historical and cross-cultural perspective; (c) know the major theorists and theoretical orientations that help explain criminal behavior; (d) be able to understand, analyze, and critically evaluate basic research and data relevant to crime and the criminal justice system; (e) demonstrate an ability to formulate a thesis and to gather and critically assess information appropriate to a topic under study; (f) have the ability to effectively communicate both in written and oral form; (g) have an understanding of career and educational options that a bachelor's degree in Criminology and Criminal Justice provides.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (39 hours)

Completion of 39 semester hours including

• CJUS 1100 - Intro/Criminal Justice \*\* Credit Hours: (3)

either

- CJUS 2226 Introduction to Police \*\* Credit Hours: (3) or
- CJUS 2326 Introduction to Courts Credit Hours: (3) or
- CJUS 2426 Intro/Corrections in America \*\* Credit Hours: (3)
- CJUS 3130 Research Methods CJUS \*\* Credit Hours: (3)
- CJUS 3540 Criminology Credit Hours: (3)
- CJUS 4110 Senior Capstone in CJUS Credit Hours: (3)
- CJUS 4130 Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3)
- an Upper Division English course
- plus 18 additional hours in criminology and criminal justice, of which at least 15 hours must be at the upper-division level.

### Note

Students will be allowed no more than 6 hours of credit toward the degree in non-classroom courses such as internships and individual directed studies.

## Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

Majors who have completed at least 55 hours of coursework (with at least 9 hours in Criminology & Criminal Justice), have an inclusive grade point average of at least 3.25, and a cumulative GPA of at least a 3.25 in the major are invited to apply for admissions to the department's honors program. Students who are admitted must complete 15 hours of honors coursework in the Department, with at least 9 hours being upper-division criminal justice courses. Honor students must maintain a grade point average of at least 3.25. Students who complete the program and the regular college requirement will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Criminology and Criminal Justice." The student's diploma and the official record at The University of Memphis will also reflect this accomplishment.

# Typical 4-Year Criminology and Criminal Justice Sequence

## Freshman Year

- CJUS 1100 Intro/Criminal Justice \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- Foreign Language/B.A. (3)
- Elective (3)
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CJUS 2226 Introduction to Police \*\* Credit Hours: (3) or
- CJUS 2326 Introduction to Courts Credit Hours: (3) or
- CJUS 2426 Intro/Corrections in America \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Science (3) \*

## Semester Totals 30-31 hrs

## Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- CJUS LD elective (3)
- Humanities (3) \*
- Natural Science (4) \*
- History (3) \*
- Social/Behavioral Science (3) \*
- Elective (3)
- Natural Science (4) \*
- Fine Arts (3) \*
- CJUS 3130 Research Methods CJUS \*\* Credit Hours: (3)

## Semester Totals 32 hrs

## Junior Year

- History (3) \*
- Elective (3)
- CJUS 3540 Criminology Credit Hours: (3)
- CJUS UD elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- UD English (3)
- CJUS 4130 Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3)
- UD elective outside major (3)
- Elective (3)
- CJUS UD elective (3)

### Semester Totals 30 hrs

## Senior Year

- CJUS UD elective (3)
- CJUS UD elective (3)
- UD elective outside major (3)
- UD elective outside major (3)
- UD elective outside major (3)
- Elective (3)
- CJUS 4110 Senior Capstone in CJUS Credit Hours: (3)
- Elective outside major (4)
- CJUS UD elective (3)

### Semester Totals 28 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Earth Sciences, (B.A.)

Program objectives are: (a) be able to demonstrate an understanding of the fundamental principles, concepts and knowledge of the discipline Earth Sciences (b) have knowledge of the effects of natural processes and human activity on the environment; (c) be able to address, solve and communicate geographic problems using quantitative methods and geographic techniques; (d) be able to critically examine community problems and develop coherent solutions to urban and other land management issues; (e) demonstrate effective written, oral and visual communication skills.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

## The Major (35-49 hours)

## Core Requirements (7 hours):

All students must take ESCI 1020 (4) and ESCI 4515 (3). In addition, all students must fulfill the requirements for one of the following concentrations:

## Concentration (28-42 hours):

### Geoarchaeology (33 hours):

- ESCI 1103 The Human Planet Credit Hours: (4)
- ESCI 2301 Fundamentals of Archaeology Credit Hours: (4)
- ESCI 4202 Geomorphology Credit Hours: (4)
- ESCI 4301 Archaeology of the Americas Credit Hours: (3)
- ESCI 4325 Archaeol Fld/Lab Techn Credit Hours: (3)
- ESCI 4350 Archaeology of Collapse Credit Hours: (3)
- ESCI 4352 Archaeology/World Prehistory Credit Hours: (3)
- ESCI 4521 Quantitative Methods Credit Hours: (3)
- and six upper division hours as approved by advisor.

### Geography (28 hours):

- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1050 The Earth Through Time Credit Hours: (4) or
- ESCI 1103 The Human Planet Credit Hours: (4)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3) or
- ESCI 4430 Economic Geography Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 4307 Thematic Studies/China Credit Hours: (3)
- ESCI 4521 Quantitative Methods Credit Hours: (3)
- and 15 additional upper division hours as approved by advisor.

### Geology (41-42 hours):

- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1050 The Earth Through Time Credit Hours: (4)
- ESCI 3311 Mineralogy/Petrology Credit Hours: (4)
- ESCI 4512 Structural Geology Credit Hours: (4)
- ESCI 3712 Sedimentology/Stratighy Credit Hours: (4)
- ESCI 4622 Geology Field Camp Credit Hours: (6)
- CHEM 1110 General Chemistry | Credit Hours: (3)

and

- CHEM 1111 General Chemistry I Lab Credit Hours: (1) and
- CHEM 1120 General Chemistry II Credit Hours: (3) and
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- PHYS 2010 General Physics | Credit Hours: (3) and
- PHYS 2011 General Physics Lab I Credit Hours: (1) and
- PHYS 2020 General Physics II Credit Hours: (3) and
- PHYS 2021 General Physics Lab II Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4) (taken as University General Education requirement)
- and 3-4 ESCI upper division hours approved by advisor.

## Electives (18-23 hours)

Electives may be chosen to bring the total number of hours to 120.

## Typical 4-Year Geoarchaeology Concentration Sequence

## Freshman Year

- Humanities/Fine Arts (3) \*
- MATH (3-4) \*
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Elective (3)
- Foreign Language/B.A. (3)
- Elective (3)
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Science (3) \*
- Foreign Language/B.A. (3)

### Semester Totals 30-31 hrs

### Sophomore Year

- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- Fine Arts (3) \*
- Elective (3)
- ESCI 1103 The Human Planet Credit Hours: (4)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

- UD elective (2)
- History (3) \*
- Elective (3)

### Semester Totals 31 hrs

### Junior Year

- ESCI 2301 Fundamentals of Archaeology Credit Hours: (4)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- History (3) \*
- ESCI 4325 Archaeol Fld/Lab Techn Credit Hours: (3)
- UD ESCI (3)
- UD Elective (3)
- Elective (3)

### Semester Totals 31 hrs

### Senior Year

- Elective (3)
- ESCI 4301 Archaeology of the Americas Credit Hours: (3)
- ESCI 4202 Geomorphology Credit Hours: (4)
- UD ESCI (3)
- UD Elective (3)
- ESCI 4352 Archaeology/World Prehistory Credit Hours: (3)
- ESCI 4350 Archaeology of Collapse Credit Hours: (3)
- ESCI 4521 Quantitative Methods Credit Hours: (3)
- Elective (3)

Semester Totals 28 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Geography Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- Humanities/Fine Arts (3) \*
- Foreign Language/B.A. (3)
- Elective (3)

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Social/Behavioral Science (3) \*
- Foreign Language/B.A. (3)
- Elective (3)

### Semester Totals 30-31 hrs

### Sophomore Year

- Elective (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3)
- Fine Arts (3) \*
- ESCI 1010 Weather and Climate Credit Hours: (4) or
- ESCI 1050 The Earth Through Time Credit Hours: (4) or
- ESCI 1103 The Human Planet Credit Hours: (4)
- UD elective (3)
- Elective (3)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- History (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Junior Year

- ESCI 1401 Intro/Cultural Geography Credit Hours: (3) or
- ESCI 4430 Economic Geography Credit Hours: (3)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- UD ESCI (3)
- UD elective (3)
- Elective (3)
- History (3) \*
- UD ESCI (3)
- UD Elective (3)
- Elective (3)
- UD Elective (3)

### Semester Totals 30 hrs

## Senior Year

- ESCI 4521 Quantitative Methods Credit Hours: (3)
- UD ESCI (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- UD ESCI (3)
- UD ESCI (3)
- UD elective (3)
- Elective (4)

### Semester Totals 28 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Geology Concentration Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- Elective (4)
- Foreign Language/B.A. (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ESCI 1040 Physical Geology Credit Hours: (4)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Foreign Language/B.A. (3)

### Semester Totals 28 hrs

### Sophomore Year

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- ESCI 1050 The Earth Through Time Credit Hours: (4)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- Fine Arts (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ESCI 3311 Mineralogy/Petrology Credit Hours: (4)

#### Semester Totals 28 hrs

## Junior Year

- History (3) \*
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab I Credit Hours: (1)
- ESCI 3712 Sedimentology/Stratighy Credit Hours: (4)
- UD Elective (3)
- History (3) \*
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)
- ESCI 4512 Structural Geology Credit Hours: (4)
- Social/Behavioral Sciences (3) \*

## Semester Totals 28 hrs

## Summer of Third or Fourth Year

• ESCI 4622 - Geology Field Camp Credit Hours: (6) Summer Field Camp

## Senior Year

- UD ESCI (4)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- UD elective (3)
- Social/Behavioral Sciences (3) \*
- Elective (3)
- Elective (3)
- UD elective (4)
- UD elective (4)
- UD elective (3)

Semester Totals 30 hrs

Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Economics, (B.A.)

Program objectives can be found in the Business Economics major in the Fogelman College of Business and Economics section.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above. The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# The Major (30 hours)

Completion of 30 semester hours, including

- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- 18 additional upper division semester hours in economics courses as approved by the department advisor.

## Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

To be considered eligible for the Honors Degree Program in Economics, the student must:

- 1. Maintain a minimum grade of B in honors sections of both ECON (TNe) 2010 Intro to Macroeconomics\*\* and ECON 2020 Intro to Microeconomics\*\*.
- 2. Obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must

- 1. Maintain an average GPA of 3.25 in all economics courses to continue in the program.
- 2. Have a minimum GPA of 3.5 in all economics courses at graduation.
- Enroll in ECON 3310 Intermediate Microeconomic Theory and ECON 3320 Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course.
- 4. Write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Typical 4-Year Economics Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3-4)
- Humanities/Fine Arts\* (3)
- Elective (3)
- Foreign Language/B.A. (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Fine Arts\* (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)

### Semester Totals 30-31 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science\* (4)
- Elective (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- History\* (3)
- History\* (3)
- Elective (3)
- Natural Science\* (4)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Junior Year

- UD elective (3)
- UD elective (3)
- UD elective (3)
- UD ECON elective (3)
- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- UD ECON elective (3)

### Semester Totals 30 hrs

### Senior Year

- Elective (3)
- UD ECON (3)
- UD ECON (3)
- UD ECON (3)
- UD ECON (3)
- UD Elective (3)
- Elective (3)
- Elective (4)
- Elective (3)

### Semester Totals 28 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Electrical Engineering, (B.S.E.E.)**

# Graduation

The minimum requirements for the degree of Bachelor of Science in Electrical Engineering are given below. The student must satisfy general university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010, MATH 1910, MATH 1920, MATH 2110, MATH 2120, a Natural Science Elective, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121, COMP 1900, or any equivalents to these courses used to satisfy degree requirements. No transfer credit with a grade less than "C-" may be used to satisfy a requirement for the Bachelor of Science in Electrical Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering or designee.

### Second Major in Mathematical Sciences

With minimal additional course work, Electrical and Computer Engineering majors are eligible for a Second Major in Mathematical Sciences. See the catalog for Mathematical Sciences.

# Honors Program

Students are eligible for the honors program in Electrical Engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Electrical Engineering requires a minimum of 8 hours of honors courses in Electrical Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.E.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Electrical Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

## Minors:

Students satisfying the requirements for the Bachelor of Science in Electrical Engineering may also satisfy requirements for a minor offered by a department in one of the other colleges. Requirements for minors are specified by the appropriate college and department. Students should submit application for the minor to the appropriate department chair. Candidates for graduation who satisfy requirements for a minor should file the approved application with the intent-to-graduate cards.

# University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

## Communication

• ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

### **Mathematics**

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences

• ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

## **Natural Science**

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

### History

Waived for B.S.E.E. students who have completed one unit of American history in high school.

## College and Degree Requirements (21 hours)

## Mathematics (14 hours)

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)

## Natural Science (4 hours)

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) or
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)
- ESCI 1040 Physical Geology Credit Hours: (4)

### Collateral Course (3 hours)

• ENGR 1010 - Engineering Problem Solving Credit Hours: (3)

## The Major (65 hours)

## Major Core (53 hours)

Completion of 53 hours including:

- EECE 1208 Intro EECE Lab Credit Hours: (1)
- EECE 1207 Electrical Engr Computations Credit Hours: (3) or
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- EECE 2201 Circuit Analysis | Credit Hours: (3)
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1)
- EECE 2207 Engineering Math Applications Credit Hours: (3)
- EECE 2222 Digital Circuit Design Credit Hours: (4)
- EECE 3201 Circuit Analysis II Credit Hours: (4)
- EECE 3213 Electrical and Computer Engineering Lab 2 Credit Hours: (1)
- EECE 3203 Signals and Systems | Credit Hours: (3)
- EECE 3204 Signals and Systems II Credit Hours: (3)

- EECE 3211 Electronics | Credit Hours: (3)
- EECE 3240 Electromagnetic Field Theory Credit Hours: (3) or
- EECE 4213 Antenna Theory/Design Credit Hours: (3) or
- EECE 4215 Applied Electromagnetic Fields Credit Hours: (3)
- EECE 3270 Intro to Microprocessor Credit Hours: (4)
- EECE 4991 Electrical/Computer Projects | Credit Hours: (3)
- EECE 4201 Energy Conversion Credit Hours: (4)
- EECE 4235 Probabilistic System Analysis Credit Hours: (3)
- EECE 4279 Professional Development Credit Hours: (3)
- EECE 4280 Electricl/Computer Engr Design Credit Hours: (3)

## Electives (12 hours)

Three (3) hours of Electrical Engineering electives must be chosen from the list below. The other 6 hours are chosen from upper division EECE courses.

## Electrical Engineering Electives (3 hours)

3 hours of Electrical Engineering electives must be chosen from:

- EECE 3212 Electronics II Credit Hours: (4)
- EECE 4230 Data Communication System Credit Hours: (3)
- EECE 4231 Communication Theory Credit Hours: (3)
- EECE 4251 Control System Engr Credit Hours: (3)
- EECE 4252 Digital Control Systems Credit Hours: (3)
- EECE 4202 Electrical Power Systems Credit Hours: (3)
- EECE 4204 Power Distribution System Credit Hours: (3)
- EECE 4205 Modern Grid with Renewables Credit Hours: (3)
- EECE 4206 Electrical Power Quality Credit Hours: (3)

## Technical Electives (3 hours)

These electives may be chosen from upper-division courses in engineering, mathematics, physics, or computer science. Approval of department chair or designee is required for all technical electives.

### Concentrations

Students may use elective hours to broaden their base of knowledge or for one of the concentrations below. A minimum of 9 semester hours is required for a concentration. EECE electives and technical may be used to complete a concentration.

### **Computer Engineering**

- EECE 4081 Software Engineering Credit Hours: (3)
- EECE 4222 Digital Logic/Computer Design Credit Hours: (3)
- EECE 4272 Engineering Software Credit Hours: (3)
- EECE 4273 Database Engineering Credit Hours: (3)
- EECE 4275 Network Programming Credit Hours: (3)
- EECE 4276 Adv Network Programming Credit Hours: (3)
- EECE 4277 DSP Microprocessors Credit Hours: (4)
- EECE 4278 Computer Organization Credit Hours: (3)

- EECE 4710 Computer Architecture Credit Hours: (3)
- EECE 4711 Fault Tolerant Computer Des Credit Hours: (3)
- EECE 4712 Embedded Systems Credit Hours: (3)
- EECE 4720 Intro Artificial Intelligence Credit Hours: (3)
- EECE 4730 Expert Systems Credit Hours: (3)
- EECE 4731 Data Visualization Credit Hours: (3)

### Electrophysics

- EECE 4241 Solid State Physcl Electronics Credit Hours: (3)
- EECE 4242 Electro-Optics Credit Hours: (3)
- EECE 4243 Linear Optical Systems Credit Hours: (3)

### Systems and Signals

- EECE 4202 Electrical Power Systems Credit Hours: (3)
- EECE 4204 Power Distribution System Credit Hours: (3)
- EECE 4221 Electronics III Credit Hours: (4)
- EECE 4232 Discrete Signal Process Credit Hours: (3)
- EECE 4251 Control System Engr Credit Hours: (3)
- EECE 4252 Digital Control Systems Credit Hours: (3)
- EECE 4253 Control Systems Lab Credit Hours: (1)

### Intelligent Systems Engineering

The new concentration requires a student to take any three (3) of the following six (6) EECE courses:

- EECE 4251 Control System Engr Credit Hours: (3)
- EECE 4712 Embedded Systems Credit Hours: (3)
- EECE 4720 Intro Artificial Intelligence Credit Hours: (3)
- EECE 4730 Expert Systems Credit Hours: (3)
- EECE 4731 Data Visualization Credit Hours: (3)
- EECE 4741 Intro to Neurocomputing Credit Hours: (3)

### Additional Note

With approval, Project II, EECE 4992 can be taken for 3 semester hours credit in any of the areas of concentration.

## Typical 4-Year Electrical Engineering Sequence

### Freshman Year

### Fall Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- EECE 1208 Intro EECE Lab Credit Hours: (1)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- Humanities/Fine Arts\* Credit Hours: (3) Total Hours: 14

#### Spring Semester

• ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) Total Hours: 15

### Academic Year Total 29 hrs

### Sophomore Year

### Fall Semester

- EECE 2201 Circuit Analysis | Credit Hours: (3)
- EECE 2203 Electrical and Computer Engineering Lab 1 Credit Hours: (1)
- EECE 2207 Engineering Math Applications Credit Hours: (3)
- EECE 2222 Digital Circuit Design Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4) Total Hours: 15

### Spring Semester

- EECE 3201 Circuit Analysis II Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) Total Hours: 14

### Academic Year Total 29 hrs

### Junior Year

### Fall Semester

- EECE 3211 Electronics | Credit Hours: (3)
- EECE 3213 Electrical and Computer Engineering Lab 2 Credit Hours: (1)
- EECE 3203 Signals and Systems | Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3)
- Natural Science Elective Credit Hours: (4)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) or
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1) or
- ESCI 1040 Physical Geology Credit Hours: (4) Total Hours: 17

### Spring Semester

- EECE 3204 Signals and Systems II Credit Hours: (3)
- EECE 3270 Intro to Microprocessor Credit Hours: (4)
- EECE 3240 Electromagnetic Field Theory Credit Hours: (3)

or

- EECE 4213 Antenna Theory/Design Credit Hours: (3) or
- EECE 4215 Applied Electromagnetic Fields Credit Hours: (3)
- EECE 4235 Probabilistic System Analysis Credit Hours: (3)
- EECE 4991 Electrical/Computer Projects | Credit Hours: (3) Total Hours: 16

### Academic Year Total 33 hrs

## Senior Year

### Fall Semester

- EECE 4201 Energy Conversion Credit Hours: (4)
- Electrical Engineering Depth Elective Credit Hours: (3)
- EECE Elective **Credit Hours:** (3)
- EECE 4279 Professional Development Credit Hours: (3)
- Humanities/Fine Arts\* Credit Hours: (3) Total Hours: 16

### Spring Semester

- EECE 4280 Electricl/Computer Engr Design Credit Hours: (3)
- EECE Elective **Credit Hours:** (3)
- ECON 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Social/Behavioral Sciences\* Credit Hours: (3)
- Technical Elective Credit Hours: (3) Total Hours: 15

## Academic Year Total 31 hrs

# Total Hours Required for Graduation: 122

\*Must satisfy University General Education Program Requirement

# Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Electrical or Computer Engineering during their senior year. Students are encouraged to begin planning to enter the Accelerated BS/MS program early in their undergraduate career, in consultation with their advisor in the Department of Electrical and Computer Engineering. Working with the undergraduate and graduate academic coordinators, undergraduates, who are selected into this program, may register for and substitute graduate level courses for undergraduate EECE electives or take and substitute cross-listed graduate versions of required undergraduate courses. This will allow the student to complete their BS degree while also beginning the coursework necessary to meet their MS degree requirements. However, any graduate coursework will not apply to the undergraduate GPA.

Students may apply for the program once they have completed one semester of junior course work. In order to remain in the program past the junior year, students must maintain a GPA of at least 3.25. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To continue in the program past the BS, students must apply for full admission into the Graduate School and the Electrical and Computer Engineering MS program during their senior year. Students that are eligible for the ABM program will have the GRE requirement waived.

# Engineering Technology, (B.S.E.T.)

## Graduation

153 To qualify for the degree of Bachelor of Science in Engineering Technology, the student must satisfy University and College requirements, and obtain a 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering technology and mathematics courses used to satisfy degree requirements.

# University General Education Program (42 hours)

See Graduation from the University link for University General Education Program requirements. Note the following are specified by the department for this program:

## Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

## Natural Science

- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

## College and Degree Requirements (7 or 8 hours)

- CHEM 1010 Chemistry of Materials\*\* Credit Hours: (3)
- CHEM 1011 Chemistry of Materials Lab \*\* Credit Hours: (1)
- MATH 1730 Pre-Calculus\*\* Credit Hours: (4)
- ENGR 1009 Prep Math for Engineering Credit Hours: (3)

## The Major (74-77 hours)

## **Engineering Technology Core**

- TECH 1010 Computer Applications in Tech Credit Hours: (3)
- TECH 1211 Computer Programming Credit Hours: (3)
- TECH 1411 Introduction to Technology Credit Hours: (2)
- TECH 1521 Graphics/Descriptive Geometry Credit Hours: (3)
- TECH 1711 Manufacturing Process | Credit Hours: (3)
- TECH 1811 Electronic Circuit Technology Credit Hours: (3)
- TECH 2821 Solid State Technology Credit Hours: (3)
- TECH 2822 Circuit Analysis Credit Hours: (4)
- TECH 2908 Applications of Technology Credit Hours: (2)
- TECH 3044 Analysis for Engineering Tech Credit Hours: (4)
- TECH 3440 Project Plan/Cost Evaluation Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- TECH 4401 Science/Technology/Society Credit Hours: (2)
- TECH 4462 Quality Improvement Credit Hours: (3)
- TECH 4943 Senior Project Plan Seminar Credit Hours: (1)
- TECH 4945 Senior Project Credit Hours: (2)

## **Engineering Technology Electives**

## Automation & Control Systems

- TECH 2831 Advanced Solid State Tech Credit Hours: (3)
- TECH 3821 Industrial Electronics Credit Hours: (3)
- TECH 3822 Programmable Logic Control Credit Hours: (4)
- TECH 4474 Automation and Robotics Credit Hours: (3)
- TECH 3841 Electrical Power/Motor Control Credit Hours: (3) or
- TECH 4823 Adv Programmable Logic Control Credit Hours: (3)

### Mechanical Systems Design

- TECH 3401 Strength of Materials Credit Hours: (3)
- TECH 3421 Manufacturing Process II Credit Hours: (4)
- TECH 3573 Dynamics/Design/Automation Credit Hours: (3)
- TECH 4472 Computer Aided Design Credit Hours: (3)
- TECH 4571 Tool Design Credit Hours: (3)

### Microprocessor Systems

- TECH 2831 Advanced Solid State Tech Credit Hours: (3)
- TECH 3232 Digital Technology Credit Hours: (4)
- TECH 3233 Microproc & Interfacing Credit Hours: (4)
- TECH 4234 Microprocessors & IOT Credit Hours: (4)

### **Operations Strategy & Lean Principles**

- TECH 4460 Work Design/Improvement Credit Hours: (3)
- TECH 4464 Production Control Systems Credit Hours: (3)
- TECH 4466 Facility Design Credit Hours: (3)

### **Product Realization**

- TECH 3401 Strength of Materials Credit Hours: (3)
- TECH 3421 Manufacturing Process II Credit Hours: (4)
- TECH 4472 Computer Aided Design Credit Hours: (3)
- TECH 4474 Automation and Robotics Credit Hours: (3)
- TECH 4476 Computer Aided Manufacturing Credit Hours: (3)

### Software Design

- TECH 2251 Adv Programming Technology Credit Hours: (3)
- TECH 2261 Data Structures Credit Hours: (3)
- TECH 4262 Modern Programming Credit Hours: (3)
- TECH 4263 Server Application Technology Credit Hours: (4)

### System/Network Administration

- TECH 3232 Digital Technology Credit Hours: (4)
- TECH 3241 Internet Technology Credit Hours: (3)
- TECH 4281 Computer Network Technology Credit Hours: (4)
- TECH 4272 Operating Systems Credit Hours: (4)

### Note

The core requirements satisfy prerequisites for these fields of study. Observe prerequisites when enrolling in courses within a particular field of study. NOTE: Substitutions must be approved by the Undergraduate Program Coordinator.

# Typical 4-Year Engineering Technology Sequence

## Freshman Year

### **Fall Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1730 Pre-Calculus\*\* Credit Hours: (4) or
- ENGR 1009 Prep Math for Engineering Credit Hours: (3)
- TECH 1411 Introduction to Technology Credit Hours: (2)
- TECH 1711 Manufacturing Process | Credit Hours: (3)
- TECH 1010 Computer Applications in Tech Credit Hours: (3) Total Hours: 14-15

### Spring Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- TECH 1211 Computer Programming Credit Hours: (3)
- TECH 1521 Graphics/Descriptive Geometry Credit Hours: (3)
- TECH 1811 Electronic Circuit Technology Credit Hours: (3) Total Hours: 16

### Semester Totals 30-31 hrs

### Sophomore Year

### Fall Semester

- TECH 2908 Applications of Technology Credit Hours: (2)
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- History Credit Hours: (3)\*
- TECH 2821 Solid State Technology Credit Hours: (3)
- TECH 2822 Circuit Analysis Credit Hours: (4) Total Hours: 16

### Spring Semester

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)
- CHEM 1010 Chemistry of Materials\*\* Credit Hours: (3)
- CHEM 1011 Chemistry of Materials Lab \*\* Credit Hours: (1)
- TECH 3044 Analysis for Engineering Tech Credit Hours: (4) Total Hours: 15

## Junior Year

Fall Semester

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- TECH 3440 Project Plan/Cost Evaluation Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- Humanities **Credit Hours:** (3)\*
- Technical Elective Credit Hours: (3) Total Hours: 15

Spring Semester

- TECH 4401 Science/Technology/Society Credit Hours: (2)
- TECH 4462 Quality Improvement Credit Hours: (3)
- History **Credit Hours:** (3)\*
- Social/Behavioral Sciences Credit Hours: (3)\*
- Technical Elective **Credit Hours:** (3)
- Technical Elective Credit Hours: (3) Total Hours: 17

Semester Totals 32 hrs

## Senior Year

### Fall Semester

- TECH 4943 Senior Project Plan Seminar Credit Hours: (1)
- Social/Behavioral Sciences Credit Hours: (3)
- Technical Elective Credit Hours: (3-4)
- Technical Elective **Credit Hours:** (3)
- Technical Elective Credit Hours: (3)
- Technical Elective Credit Hours: (3) Total Hours: 16-17

Spring Semester

- TECH 4945 Senior Project Credit Hours: (2)
- Humanities **Credit Hours:** (3)\*
- Technical Elective Credit Hours: (3-4)
- Technical Elective **Credit Hours:** (3)
- Technical Elective Credit Hours: (3) Total Hours: 14-15

Semester Totals 30-32 hrs

# Total Hours Required for Graduation: 123-125

\*Must satisfy University General Education Program Requirements

# Accelerated B.S./M.S. Program

157 This program allows outstanding undergraduates to begin the coursework for the Master of Science in Engineering Technology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.0 grade point average. Each applicant will complete an interview with the graduate academic coordinator for Engineering Technology.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

Only in ABM programs, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# English, (B.A.)

Program objectives for a B.A. in English are: (a) to develop skills in critical thinking, reading, and writing; (b) to have opportunities to consider the relationships among language, literature, culture, and writing; (c) to concentrate study of these interrelated areas in one of six endeavors, each with its own particular focus: African American literature, applied linguistics, creative writing, English as a second language, literature, and professional writing.

# University General Education Program (41 Hours)

See Graduation from the University for the University General Education Program requirements. English majors take ENGL 1010, ENGL 1020, and ENGL 2201 or ENGL 2202 to complete General Education Program Requirements and English Major requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (33 hours in addition to University General Education Program)

ENGL 1010, 1020, and 2201 or 2202 or equivalents with a minimum grade of "C-" are prerequisites for all upper division (3000 and 4000-level) courses in the Department of English.

### Major Core (12 hours)

- ENGL 3210 British Lit to 1750 \*\* Credit Hours: (3)
- ENGL 3220 British Lit since 1750 \*\* Credit Hours: (3)
- ENGL 3327 American Literature to 1865 \*\* Credit Hours: (3)

### One Course from the following:

Note: Creative Writing Concentration must select ENGL 4599, 4604, or 4605. Professional Writing Concentration and ESL-Licensure Track must select ENGL 3604 or ENGL 4602.

- ENGL 3501 Modern English Grammar \*\* Credit Hours: (3)
- ENGL 3511 Intro to Linguistics \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- ENGL 3701 Lit Criticism/Theory Credit Hours: (3)
- ENGL 4501 History of English Lang Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- ENGL 4599 Forms of Creative Nonfiction Credit Hours: (3)
- ENGL 4602 Adv Composition \*\* Credit Hours: (3)
- ENGL 4604 Forms of Poetry Credit Hours: (3)
- ENGL 4605 Forms of Fiction Credit Hours: (3)

## Concentrations (12 hours)

#### A concentration must be chosen from

- English African-American Literature Concentration, (B.A.)
- English Creative Writing Concentration, (B.A.)
- English English as a Second Language Concentration, (B.A.)
- English Language and Linguistics Concentration, (B.A.)
- English Literature Concentration, (B.A.)
- English Professional Writing Concentration, (B.A.)

## Tracks

English - English as a Second Language Licensure Track, (B.A.)

## Note the Following:

- 1. Students should see the English advisor who will explain the advantages of the various concentrations and assist students in developing an appropriate program of study.
- 2. Courses taken to satisfy the core requirements may not be used to satisfy concentration requirements.
- 3. No more than a total of six (6) hours in ENGL 3100-3119, ENGL 4101-4110-ENGL 4109, and 3 hours in ENGL 4900 may be applied to the English major.
- 4. Students who wish to satisfy the requirements for both the English major and the endorsement to teach English in high school should consult the College of Education for licensure requirements.
- 5. ENGL 3500 and ENGL 3603 may not be used to satisfy any requirement for the English major.
- 6. ENGL 4900 and ENGL 4996 may not be used to satisfy required hours in any concentration.

## Electives (9 hours)

Nine hours of upper-division ENGL courses.

## Honors Program

Honors sections of English courses required to fulfill lower-division general education requirements (ENGL 1010, ENGL 1020, ENGL 2201, ENGL 2202) are open to qualified students enrolled in University Honors, regardless of their major. The Department of English also offers an honors program open only to English majors, who maintain an inclusive grade point average of at least 3.25 and a cumulative grade point average of at least 3.25 in all coursework counting toward the major. For a degree conferred "with Honors in English," students must take 12 hours of English Honors coursework as follows:

- ENGL 4995 Honors Thesis Research
- ENGL 4996 Honors Thesis
- plus two additional upper-division English courses taken for Honors credit

Details of the program are available at https://www.memphis.edu/english.

# Typical 4-Year English Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities (3) \*
- MATH (3-4) \*
- Foreign Language/B.A. (3)
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Fine Arts (3) \*
- Foreign Language/B.A. (3)
- Elective (3)

## Totals 30-31 hrs

## Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History (3) \*
- Elective (3)
- Natural Science (4) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ENGL 3210 British Lit to 1750 \*\* Credit Hours: (3)
- History (3) \*
- Elective (3)
- Natural Science (4) \*
- ENGL Core Elective (3)

### Semester Totals 32 hrs

### Junior Year

- ENGL 3220 British Lit since 1750 \*\* Credit Hours: (3)
- ENGL concentration (3)
- Social/Behavioral Science (3) \*
- Elective (3)
- Elective (3)
- ENGL 3327 American Literature to 1865 \*\* Credit Hours: (3)
- ENGL concentration (3)
- Social/Behavioral Science (3) \*
- Elective (3)
- UD ENGL elective (3)

### Semester Totals 30 hrs

## Senior Year

- UD ENGL elective (3)
- ENGL concentration (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- UD ENGL elective (3)
- ENGL concentration (3)
- UD elective (3)
- Elective (4)

Semester Totals 28 hrs

Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Film and Video Production, Communication (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (33-37 hours)

## Major Core (6 hours)

All students must take

- COMM 2100 Communication Inquiry \*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) (included in the University General Education Program)

### Note

A 2.0 cumulative GPA and a grade no lower than a C- is required for all courses completed in the major. In addition, all students must fulfill the requirements for one of the following concentrations:

# Film and Video Production (27-29 hours):

- COMM 3823 Motion Picture Prod I Credit Hours: (4)
- COMM 3824 Motion Picture Prod II Credit Hours: (4)
  - COMM 3842 TV Studio Production I Credit Hours: (4) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## Three Production or Writing courses:

- COMM 4822 Audio Production Film/Video Credit Hours: (3)
- COMM 4824 Cinematography Credit Hours: (3)
- COMM 4825 Editing/Post Production Credit Hours: (3)
- COMM 4841 Television Workshop Credit Hours: (3)
- COMM 4842 TV Studio Production II Credit Hours: (4)
- COMM 4960 Documentary Writing Credit Hours: (3)
- COMM 4970 Screenwriting Credit Hours: (3)

### Two Film Studies courses

- COMM 3003 Television and Culture\*\* Credit Hours: (3)
- COMM 4220-4229 Special Topics in Film Credit Hours: (1-3)
- COMM 4850 Film History | Credit Hours: (3)
- COMM 4851 Film History II Credit Hours: (3)
- COMM 4853 Documentary Form Film Credit Hours: (3)
- COMM 4854 Documentary Form Broadcasting Credit Hours: (3)
- COMM 4856 Gender and Film Credit Hours: (3)
- COMM 4858 Contemporary Cinema Credit Hours: (3)
- COMM 4859 Monster Films Credit Hours: (3)
- COMM 4860 Reality TV \*\* Credit Hours: (3)
- COMM 4861 Science Fiction Film Credit Hours: (3)

## Electives (12 - 20 hours)

Completion of courses to bring the total to 120 semester hours.

## Honors Program

To be eligible for admission to the Communication Honors program a student must meet the following requirements: (1) declare a major in Communication, (2) have completed 12 hours of Communication coursework, (3) have Department of Communication faculty member as an adviser, and (4) make an honors application to the adviser. Applications may be obtained from the director of the honors program or from the department office.

To be awarded departmental honors at graduation with the designation "With Honors in Communication," a student must fulfill the following requirements: (1) maintain a 3.5 GPA in communication coursework, (2) maintain a 3.5 GPA overall, (3) complete all Department of Communication major requirements, (4) complete an independent thesis or an independent film/video project sponsored by a Department of Communication faculty member consisting of six hours over two semesters: three hours in research preparation (COMM 3330, COMM 4381, or COMM 4891), and three hours in completing the thesis project (COMM 4999), and (5) successful defense of the thesis.

# Typical 4-Year Film and Video Production Concentration Sequence

## **Freshman Year**

- COMM 1851 Introduction to Film\*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Math (3)
- Foreign Language/B.A. (or elective)\*\* (3)
- Natural Science (4)\*
- COMM 2100 Communication Inquiry \*\* Credit Hours: (3)

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Science\* (3)
- Foreign Language/B.A. (or elective)\*\* (3)
- Natural Science (4)\*

Semester Totals 32-33 hrs

## Sophomore Year

- COMM 3823 Motion Picture Prod I Credit Hours: (4)
- Foreign Language/B.A. (3)
- Social/Behavioral Science (3)\*
- History\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 3824 Motion Picture Prod II Credit Hours: (4)
- COMM Film Studies Course (3)
- Foreign Language/B.A. (3)
- Humanities (3)\*
- History\* (3)

### Semester Totals 32 hrs

### Junior Year

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- COMM 3842 TV Studio Production | Credit Hours: (4)
- Elective (3)
- UD elective (3)
- UD elective (3)
- COMM Production/Writing Course (3)
- COMM Film Studies Course (3)
- UD elective (3)
- UD elective (3)
- Elective (3)

### Semester Totals 31 hrs

### Senior Year

- COMM Production/Writing Course (3)
- UD COMM elective (3)
- UD Elective (3)
- Elective (3)
- COMM Production/Writing Course (3)
- UD COMM elective (3)
- Elective (3)
- Elective (3)

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\* Must satisfy University General Education Program Requirement

# Finance (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)

- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)

### Finance major requirements

Choose 1 or more courses from the following:

- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- FIR 4721 Fixed Income and Derivatives Credit Hours: (3)

Choose 1 or more courses from the following:

- FIR 4610 Cases Managerial Finance \*\* Credit Hours: (3)
- FIR 4620 Cases in Financial Planning Credit Hours: (3)
- FIR 4730 Financial Analysis/Certification \*\* Credit Hours: (3)

Choose courses (up to 4) from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 2811 Field Experiences in Finance Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 3810 Principles of Risk/Insurance Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4331 Stock Portfolio Mgmt Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4770 Security Analysis/Portfolio Management Credit Hours: (3)
- FIR 4870 Risk Management \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)
- ACCT 3510 Federal Income Tax I \*\* Credit Hours: (3)
- ECON 3610 Money and Banking Credit Hours: (3)
- ECON 4120 Economic Forecasting Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Finance Major Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- FIR 1220 Personal Financial Management Credit Hours: (3)
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

## Semester Totals 28-30 hrs

## Sophomore Year

Elective (3)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \* or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Elective (3)
- Humanities/Fine Arts (3) \*

### Semester Totals 32 hrs

### Junior Year

- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)

- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- FIR elective (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Senior Year

- FIR 4011 or FIR 4550 or FIR 4710 or FIR 4720 or FIR 4721 (3)
- FIR elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- Elective (3)
- FIR elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)
- FIR 4610 or FIR 4620 or FIR 4720 (3)
- International Business elective (3)
- FIR elective (3)

### Semester Totals 30 hrs

### Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Finance - Real Estate Concentration, (B.B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)

Take either:

- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)

## Real Estate concentration (18 hours):

- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)

Choose 3 courses from the following:

• FIR 1220 - Personal Financial Management Credit Hours: (3)

- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)
- ESCI 4515 Geographic Info Science Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Typical 4-Year Real Estate Concentration Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- FIR 1220 Personal Financial Management Credit Hours: (3)
- or
- Elective (3)
- MATH 1710 College Algebra Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)

Humanities/Fine Arts (3) \*

- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \* or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- Natural Science (4) \* Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- History (3) \*
- Natural Science (4) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)

• Elective (1-3)

### Semester Totals 30-32 hrs

### Junior Year

- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- FIR elective (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)

### Semester Totals 30 hrs

## Senior Year

- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR elective (3)
- FIR elective (3)
- Elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 30 hrs

Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Dietetics Concentration (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing

170 desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## Note:

As part of the University General Education Program requirements, Dietetics concentration must take the following courses:

#### **Natural Science**

- CHEM 1110 General Chemistry I
- CHEM 1111 General Chemistry I Lab
- CHEM 1120 General Chemistry II
- CHEM 1121 General Chemistry II Lab

#### Social/Behavioral Sciences:

- PSYC 1030
- CDFS 2101 OR SOCI 1010 OR ANTH 1200

## The Major (11 hours)

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

## Dietetics (63 hours):

- NUTR 2102 Intro to Dietetics Credit Hours: (2)
- NUTR 2302 Introduction to Culinary Nutrition Credit Hours: (3)
- NUTR 2303 Intro to Culinary Laboratory Credit Hours: (1)
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- NUTR 3002 Advanced Human Metabolism | Credit Hours: (3)
- NUTR 4010 Management and Food Systems Credit Hours: (3)
- NUTR 4000 Senior Seminar in Dietetics Credit Hours: (1)
- NUTR 4102 Medical Nutrition Therapy | Credit Hours: (3)
- NUTR 4112 Medical Nutrition Therapy II Credit Hours: (3)
- NUTR 4602 Community Nutrition Credit Hours: (3)
- NUTR 4802 Experimental Foods Credit Hours: (3)
- NUTR 4803 Experimental Foods Laboratory Credit Hours: (1)
- NUTR 4812 Adv Human Metabolism II Credit Hours: (3)
- HMSE 4999 Senior Project/HSS \*\* Credit Hours: (3)
- BIOL 1230 Microbiology \*\* Credit Hours: (3)
- BIOL 1231 Microbiology Lab \*\* Credit Hours: (1)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)

- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- HLSC 4400 Statistics for Health Sciences Credit Hours: (3)
- HLSC 4520 Health and Lifestyle Counseling Credit Hours: (3)
- NUTR 4605 Internship Credit Hours: (3)

# Electives (5 hours)

Selected in consultation with advsor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

## **Typical 4-Year Dietetics Concentration Sequence**

## **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Mathematics (3) \*
- History (3) \*
- Humanities/Fine Arts (3) \*
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- History (3) \*
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

## Year Total 32 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202
- NUTR 2102 Intro to Dietetics Credit Hours: (2)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- NUTR 2302 Introduction to Culinary Nutrition Credit Hours: (3)
- NUTR 2303 Intro to Culinary Laboratory Credit Hours: (1)
- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)

### Year Total 31 hrs

- BIOL 1230 Microbiology \*\* Credit Hours: (3)
- BIOL 1231 Microbiology Lab \*\* Credit Hours: (1)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- NUTR 3002 Advanced Human Metabolism I Credit Hours: (3)
- NUTR 4010 Management and Food Systems Credit Hours: (3)
- HLSC 4400 Statistics for Health Sciences Credit Hours: (3)
- HLSC 4520 Health and Lifestyle Counseling Credit Hours: (3)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- Elective (3)

## Year Total 29 hrs

## Senior Year

- NUTR 4102 Medical Nutrition Therapy I Credit Hours: (3)
- NUTR 4802 Experimental Foods Credit Hours: (3)
- NUTR 4803 Experimental Foods Laboratory Credit Hours: (1)
- NUTR 4812 Adv Human Metabolism II Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- NUTR 4000 Senior Seminar in Dietetics Credit Hours: (1)
- NUTR 4112 Medical Nutrition Therapy II Credit Hours: (3)
- Elective (2)
- NUTR 4602 Community Nutrition Credit Hours: (3)
- NUTR 4605 Internship Credit Hours: (3)
- HMSE 4999 Senior Project/HSS \*\* Credit Hours: (3)

Year Total 28 hrs

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Exercise, Sport & Movement Sciences Concentration (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

Students must complete all major and concentration requirements with a C- or better to be eligible to enroll in their internship.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## Note:

Exercise, Sport & Movement Sciences concentration may take any two of the following General Education natural sciences courses with lab in addition to BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021: BIOL 1010/BIOL 1011 (4); BIOL 1020/BIOL 1021 (4); BIOL 1110/BIOL 1111 (4); BIOL 1120/BIOL 1121 (4); CHEM 1010/CHEM 1011 (4); CHEM 1020/CHEM 1021 (4); CHEM 1110/CHEM 1111 (4); CHEM 1120/CHEM 1121 (4); PHYS 1010/PHYS 1001 (4); PHYS 2110/PHYS 2111 (4); PHYS 2120/PHYS 2121 (4).

## The Major (11 hours)

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

## Exercise, Sport & Movement Sciences (50 hours):

- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- ESMS 2004 Intro to Exercise Science Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3) Must pass BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021, HMSE 2000, ESMS 2004, & ESMS 2015 with minimum grade C- to register for upper division ESMS courses
- ESMS 3020 Exercise and Sport Mechanics Credit Hours: (3)
- ESMS 3050 Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
- ESMS 3410 Anatomical Kinesiology | Credit Hours: (3)
- ESMS 3415 Anatomical Kinesiology II Credit Hours: (3)
- ESMS 3450 Psychological Aspects of Exercise Credit Hours: (3)
- ESMS 3603 Exercise Physiology | Credit Hours: (3)
- ESMS 3703 Exercise Physiology II Credit Hours: (3)
- ESMS 3803 Motor Learning Credit Hours: (3)
- ESMS 4000 Exercise Testing Interpretation Lab Credit Hours: (3)
- ESMS 4015 Exercise Programs for Special Populations Credit Hours: (3)
- ESMS 4603 Adv Meth/Strength Conditioning Credit Hours: (3)
- HLSC 4400 Statistics for Health Sciences Credit Hours: (3)
- ESMS 4605 Internship Credit Hours: (3-6)

# Electives (18 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. Guided Electives.

In some of the above courses, variable hours of supervised laboratory/field experience will be required.

# Typical 4-Year Exercise, Sport, & Movement Sciences Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Mathematics (3) \*
- Social/Behavioral Sciences (3) \*
- Natural Sciences (4) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3)\*
- Natural Sciences (4)\*
- Social/Behavioral Sciences (3)\*
- Humanities/Fine Arts (3)\*

### Year Total 32 hrs

### Sophomore Year

- History (3) \*
- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- ESMS 2004 Intro to Exercise Science Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202
- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Elective (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)

### Year Total 28 hrs

### Junior Year

- ESMS 3050 Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
- ESMS 3410 Anatomical Kinesiology | Credit Hours: (3)
- ESMS 3415 Anatomical Kinesiology II Credit Hours: (3)
- ESMS 3703 Exercise Physiology II Credit Hours: (3)
- ESMS 3803 Motor Learning Credit Hours: (3)
- Elective (3)
- ESMS 3450 Psychological Aspects of Exercise Credit Hours: (3)
- ESMS 3603 Exercise Physiology | Credit Hours: (3)
- ESMS 3020 Exercise and Sport Mechanics Credit Hours: (3)
- Elective (3)
- Elective (3)

### Year Total 33 hrs

### Senior Year

- ESMS 4000 Exercise Testing Interpretation Lab Credit Hours: (3)
- ESMS 4015 Exercise Programs for Special Populations Credit Hours: (3)
- ESMS 4603 Adv Meth/Strength Conditioning Credit Hours: (3)
- HLSC 4400 Statistics for Health Sciences Credit Hours: (3)
- Elective (3) \*
- ESMS 4605 Internship Credit Hours: (3-6) (6)
- Elective (3)
- Elective (3)

### Year Total 27 hrs

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Health Sciences Concentration, (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

Students must complete all major and concentration requirements with a C- or better to be eligible to enroll in their internship.

# University General Education Program (33 hours)

See University General Education Program for University General Education Program requirements. Note the following requirements are specified for this program:

## Natural Science

Natural Science requirements are fulfilled by BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 as part of the major core for Health Sciences and Healthcare Leadership concentrations.

## Note:

Health Sciences concentration must take:

Social/Behavioral Science:

PSYC 1030 - General Psychology\*\* Credit Hours: (3)

# The Major (11 hours)

• BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3)

- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

## Health Sciences (36 hours):

- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)
- HLSC 3505 Prin/Health Fitness Instruc Credit Hours: (3)
- HLSC 3522 Assessment and Program Evaluation in Health Sciences (HSCI) Credit Hours: (3)
- HLSC 3606 Leadership and Communication in Health Sciences Credit Hours: (3)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- HLSC 3800 Strategic Planning & Program Development Credit Hours: (3)
- HLSC 4500 Project Management in Health Sciences Credit Hours: (3)
- HLSC 4520 Health and Lifestyle Counseling Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- HLSC 4605 Internship Credit Hours: (6-9)

## Electives (40 - 43 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

## Typical 4-Year Health Sciences Concentration Sequence

## **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities (3) \*
- Mathematics (3) \*
- History (3) \*
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- Humanities (3)\*
- Elective (3)

### Year Total 30 hrs

### Sophomore Year

- History (3) \*
- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- Social/Behavioral Science (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)
- Elective (3)
- Elective (3)

### Year Total 32 hrs

### Junior Year

- HLSC 3522 Assessment and Program Evaluation in Health Sciences (HSCI) Credit Hours: (3)
- HLSC 3800 Strategic Planning & Program Development Credit Hours: (3)
- HLSC 3505 Prin/Health Fitness Instruc Credit Hours: (3)
- Elective (3)
- Elective (3)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- HLSC 3606 Leadership and Communication in Health Sciences Credit Hours: (3)
- HLSC 4520 Health and Lifestyle Counseling Credit Hours: (3)
- Elective (3)
- Elective (3)

### Year Total 30 hrs

### Senior Year

- HLSC 4500 Project Management in Health Sciences Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- Elective (3)
- Elective (3) Elective (3)
- HLSC 4605 Internship Credit Hours: (6-9)
- Elective (3)
- Elective (4)

### Year Total 28 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Must show proof of current First Aid and CPR certification before Internship.

# Health Studies - Healthcare Leadership Concentration, (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

# University General Education Program (33 hours)

See University General Education Program for University General Education Program requirements. Note the following requirements are specified for this program:

## Natural Science

Natural Science requirements are fulfilled by BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 as part of the major core for Health Sciences and Healthcare Leadership concentrations.

# The Major (11 hours)

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

## Healthcare Leadership (47 hours):

- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- HCL 3000 Healthcare Leadership \*\* Credit Hours: (3)
- HCL 3010 Healthcare Financial Mgmt \*\* Credit Hours: (3)
- HCL 3020 Healthcare Informatics \*\* Credit Hours: (3)
- HCL 3030 Healthcare Strategic Plan/Mktg \*\* Credit Hours: (3)
- HCL 3040 U S Health System \*\* Credit Hours: (3)
- HCL 3050 Prof Writing Healthcare \*\* Credit Hours: (3)
- COMM 3012 Health Communication \*\* Credit Hours: (3)
- HCL 4000 Health Policy Issues \*\* Credit Hours: (3)
- HCL 4010 Healthcare Stats/Research \*\* Credit Hours: (3)
- HCL 4020 Law/Ethics of Healthcare \*\* Credit Hours: (3)
- HCL 4030 Healthcare Human Resources \*\* Credit Hours: (3)
- HCL 4040 Business Principles/Healthcare \*\* Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- HCL 4605 Internship \*\* Credit Hours: (3-6)

# Electives (29-32 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. Guided Electives.

In some of the above courses, variable hours of supervised laboratory/field experience will be required.

# Typical 4-Year Healthcare Leadership Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Mathematics (3) \*
- Humanities/Fine Arts (3) \*
- Social/Behavioral Sciences (3) \*
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- Elective (3)

## Year Total 29 hrs

## Sophomore Year

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- Elective (3) \*
- History (3) \*
- Social/Behavioral Sciences (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- History (3) \*
- Elective (3)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

## Year Total 32 hrs

### Junior Year

- HCL 3000 Healthcare Leadership \*\* Credit Hours: (3)
- HCL 3030 Healthcare Strategic Plan/Mktg \*\* Credit Hours: (3)
- HCL 3040 U S Health System \*\* Credit Hours: (3)
- HCL 3050 Prof Writing Healthcare \*\* Credit Hours: (3)
- Elective (3)
- HCL 3010 Healthcare Financial Mgmt \*\* Credit Hours: (3)
- HCL 3020 Healthcare Informatics \*\* Credit Hours: (3)
- HCL 4000 Health Policy Issues \*\* Credit Hours: (3)
- HCL 4020 Law/Ethics of Healthcare \*\* Credit Hours: (3)
- HCL 4030 Healthcare Human Resources \*\* Credit Hours: (3)

### Year Total 30 hrs

## Senior Year

- HCL 4010 Healthcare Stats/Research \*\* Credit Hours: (3)
- HCL 4040 Business Principles/Healthcare \*\* Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- COMM 3012 Health Communication \*\* Credit Hours: (3)
- Elective (2)
- HCL 4605 Internship \*\* Credit Hours: (3-6)
- Elective (3)
- Elective (3)
- Elective (3)

### Year Total 29 hrs

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Internship is for 6 hours unless student has five years or more in a healthcare occupation, then for 3 hours.

# History, (B.A.)

The Department of History introduces students to the richness and complexity of the human experience through a curriculum that covers all major geographic areas and time periods, and emphasizes both the unity of that experience and the diversity resulting from such factors as cultural, social, and gender differences. We seek to develop not only a knowledge of the past, but also an appreciation of history as an intellectual discipline that employs a wide variety of scholarly methodologies in its effort to understand that past. Students are taught to think and work as historians: to read critically and analytically both primary and secondary sources, to appreciate the complexity of historical issues and multiplicity of historical views, and to investigate a historical question or problem and communicate the results of that investigation. Through this broad preparation, history majors acquire essential knowledge and critical skills, which provide valuable assets for a wide spectrum of professions and occupations as well as the fundamental basis for advanced study. Program objectives for a B.A. in History are: (a) a fundamental knowledge of the past, including key historical events, ideas, figures, movements, and periods; (b) an awareness of the diversity of historical experiences over time and space; (c) the ability to recognize, locate, analyze critically, and utilize primary and secondary sources; (d) the ability to recognize and evaluate differing historical interpretations and methodologies; (e) the ability to research a topic thoroughly using both primary and secondary sources, and well-written historical argument based on that research; (f) express a high degree of satisfaction with the quality of the education received in that program.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (33 hours)

Majors must complete 33 semester hours in history courses. Of the 33 hours, at least 9 hours must be from HIST 1110, HIST 1120, HIST 2010, and HIST 2020; and at least 21 hours must be in upper-division courses. Of the 21 upper-division hours required, at least 6 must be taken outside of the European and United States fields and a maximum of 18 may be taken in any one field (African, Ancient, Asian, European, Latin American, Middle Eastern, United States).

## Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

For information on the honors program in History, please visit http://www.memphis.edu/history/undergraduate/honors.php.

# Typical 4-Year History Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- HIST LD (3) \*\*\*
- Foreign Language/B.A. (3) \*\*
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- HIST LD (3) \*\*\*
- Foreign Language/B.A. (3) \*\*
- Social/Behavioral Sciences (3) \*

### Semester Totals 30-31 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- HIST LD (3) \*\*\*
- Natural Science (4) \*
- Fine Arts (3)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Elective (3)
- Natural Science (4) \*
- Social/Behavioral Sciences (3) \*
- UD elective (3)

### Semester Totals 32 hrs

### Junior Year

- UD Elective (3)
- Elective (3)
- Elective (3)
- UD HIST (3)
- UD HIST (3)
- Humanities/Fine Arts (3)
- Elective (3)
- UD HIST (3)
- UD HIST (3)
- UD elective (3)

### Semester Totals 30 hrs

### Senior Year

- UD HIST (3)
- UD HIST (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- UD HIST (3)
- UD elective (3)
- UD elective (3)
- Elective (4)

Semester Totals 28 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* This plan assumes you are starting your language courses at the intermediate (2010/2020) level required for the degree. If you need to start your language sequence at an earlier level, please account for that and plug those courses into the plan. This will require that you remove one to two "elective" slots and replace them with the necessary language courses.

\*\*\*HIST LD - choose 3 from HIST 1110, HIST 1120, HIST 2010, or HIST 2020

# Hospitality and Resort Management (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirement are in addition to the University General Education Program requirements.

# The Major (35 hours)

- HPRM 1050 Business of Hospitality Credit Hours: (3)
- HPRM 2011 Hosp Ind Managerial Acct Credit Hours: (3)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3060 Food & Bev. Production Theory Credit Hours: (1)
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)
- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1)
- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)
- HPRM 3320 Hospitality Financial Mgmt Credit Hours: (3)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)

- HPRM 3911 Pre-Intern & Prof Development Credit Hours: (3)
- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3)
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)

# Electives (35-38 hours)

Electives may be chosen to bring the total number of hours to 120.

### Typical 4-Year Hospitality and Resort Management Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Mathematics\* (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- HPRM 1050 Business of Hospitality Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Elective (1)
- Social/Behavioral Sciences\* (4)
- Fine Arts/B.A. (3)

#### Semester Totals 29 hrs

### Sophomore Year

- History\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \* or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- HPRM 2011 Hosp Ind Managerial Acct Credit Hours: (3)
- Social/Behavioral Sciences\* (3)
- Natural Science (4)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)
- Elective (3)
- Natural Science (4) \*
- Humanities/B.A.\* (3)
- HPRM 3911 Pre-Intern & Prof Development Credit Hours: (3)

#### Semester Totals 31 hrs

#### Junior Year

- History\* (3)
- HPRM 3060 Food & Bev. Production Theory Credit Hours: (1)
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)
- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)

- Elective (3)
- Humanities/Fine Arts\* (3)
- HPRM 3320 Hospitality Financial Mgmt Credit Hours: (3)
- Elective (4)
- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1)

#### Semester Totals 30 hrs

#### Senior Year

- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3)
- HPRM 4620 Hospitality Operational Anlys Credit Hours: (3)
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3)
- Elective (3)
- Upper Division Elective (3)
- HPRM 4700 Integrative Challenge Credit Hours: (3)
- Elective (3)
- Elective (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)
- Upper Division Elective (3)

#### Semester Totals 30 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Hospitality and Resort Management - Culinary Arts Concentration (B.A.)

Students in the B.A. program in Hospitality and Resort Management wishing to receive specialized knowledge and skills in Culinary Arts can choose to complete 24 credit hours in the culinary arts area as part of their electives to earn the concentration designation. For more information contact kwci@memphis.edu

### University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

### College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (35 hours)

- HPRM 1050 Business of Hospitality Credit Hours: (3)
- HPRM 2011 Hosp Ind Managerial Acct Credit Hours: (3)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3060 Food & Bev. Production Theory Credit Hours: (1)
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)

- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1)
- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)
- HPRM 3320 Hospitality Financial Mgmt Credit Hours: (3)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)
- HPRM 3911 Pre-Intern & Prof Development Credit Hours: (3)
- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3)
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)

### Culinary Arts Concentration (24 hours)

- HPRM 3013 Advanced Culinary Skills Credit Hours: (3)
- HPRM 3014 Pastry & Baking Credit Hours: (3)
- HPRM 3015 Food Analysis Credit Hours: (3)
- HPRM 3016 Garde Manger Credit Hours: (3)
- HPRM 3018 International Cuisine Credit Hours: (3)
- HPRM 3050 Food/Beverage Controls Credit Hours: (3)
- HPRM 3810 Food Safety & Sanitation in Hospitality Credit Hours: (3)
- HPRM 4012 Senior Culinary Design Credit Hours: (3)

### Electives (11-14 hours)

Electives may be chosen to bring the total number of hours to 120.

### Typical 4-Year Culinary Arts Concentration Sequence

\*\*Class offered at the Kemmons Wilson Culinary Institute (Cordova)

#### Freshman Year

#### First Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Mathematics\* (3)
- History\* (3)
- HPRM 1050 Business of Hospitality Credit Hours: (3)

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History\* (3)
- Social/Behavioral Sciences\* (3)
- Fine Arts/B.A. (3)
- Elective (1)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3) \*\*

#### Semester Totals 31 hours

#### Sophomore Year

**First Semester** 

- HPRM 3911 Pre-Intern & Prof Development Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- HPRM 3013 Advanced Culinary Skills Credit Hours: (3) \*\*
- HPRM 3810 Food Safety & Sanitation in Hospitality Credit Hours: (3) \*\*
- HPRM 2003 Special Events Credit Hours: (1)
- Foreign Language/B.A. (3)

#### Second Semester

- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)
- Foreign Language/B.A. (3)
- HPRM 2011 Hosp Ind Managerial Acct Credit Hours: (3)
- Natural Science with lab (4) \*

#### Semester Totals 31 hours

#### Junior Year

#### **First Semester**

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/B.A.\* (3)
- Natural Science with lab\* (4)
- Social/Behavioral Sciences\* (3)
- HPRM 3014 Pastry & Baking Credit Hours: (3)

#### Second Semester

- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1) \*\*
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)
- HPRM 3018 International Cuisine Credit Hours: (3) \*\*
- HPRM 3050 Food/Beverage Controls Credit Hours: (3) \*\*

#### Semester Totals 30 hours

### Senior Year

#### **First Semester**

- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3) \*\*
- HPRM 3015 Food Analysis Credit Hours: (3) \*\*
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3) \*\*
- HPRM 3016 Garde Manger Credit Hours: (3) \*\*
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)

#### Second Semester

- HPRM 4012 Senior Culinary Design Credit Hours: (3) \*\*
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)
- HPRM 3017 Culinary Procurement & Purchasing Credit Hours: (3) \*\*
- HPRM 3650 Comm & Rec Food Serv Mgmt Credit Hours: (3)
- HPRM 3680 Intro to Wine & Spirits Credit Hours: (3)

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Hospitality and Resort Management - Lodging Management Concentration (B.A.)

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (35 hours)

- HPRM 1050 Business of Hospitality Credit Hours: (3)
- HPRM 2011 Hosp Ind Managerial Acct Credit Hours: (3)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3060 Food & Bev. Production Theory Credit Hours: (1)
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)
- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1)
- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)
- HPRM 3320 Hospitality Financial Mgmt Credit Hours: (3)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)
- HPRM 3911 Pre-Intern & Prof Development Credit Hours: (3)
- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3)
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)

### Lodging Management Concentration (21 hours)

- HPRM 4007 Resort and Timeshare Mgmt Credit Hours: (3)
- HPRM 4331 Adv Resort/Lodging Management Credit Hours: (3)
- HPRM 4340 Information Technology HPRM Credit Hours: (3)
- HPRM 4350 Properties Develomnt/Planning Credit Hours: (3)
- HPRM 4400 International Hospitality Credit Hours: (3)
- HPRM 4620 Hospitality Operational Anlys Credit Hours: (3)
- HPRM 4700 Integrative Challenge Credit Hours: (3)

# Electives (14-17 hours)

Electives may be chosen from HPRM courses to bring the total number of hours to 120.

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Human Development and Learning, (B.S.Ed.)

Program objective for a B.S.Ed. in Human Development and Learning are: (a) to promote child development and learning; (b) to build family and community relationships; (c) to observe, document, and assess young children and families; (d) to teach and learn, to design, implement and evaluate experiences that promote positive development and learning for all children.

Successful completion of B.S.Ed. requirements with a major in Human Development and Learning will qualify a person to apply for licensure in Early Childhood Education (PreK-3).

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

### Mathematics (3 hours)

MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3)

### Humanities (9 hours)

#### Choose One:

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

#### Choose One:

- ART 1030 Intro to Art\*\* Credit Hours: (3)
- MUS 1030 Introduction to Music\*\* Credit Hours: (3)
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)

### Choose One:

- CLAS 2481 Mythology \*\* Credit Hours: (3)
- PHIL 1101 Intro to Philosophy Credit Hours: (3)
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)

### History (6 hours)

#### Choose One:

- HIST 2010 U S to 1877 Credit Hours: (3)
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3)
- HIST 2030 Tennessee History\*\* Credit Hours: (3)

### Choose One:

- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)

### Social/Behavioral Sciences (6 hours)

Choose One:

- ESCI 1301 Survey of World Regions Credit Hours: (3)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)

### **Required Course:**

• POLS 1030 - American Government\*\* Credit Hours: (3)

### Natural Science (8 hours)

(Choose one course and applicable lab from List 1 and List 2)

### List 1

- BIOL 1010 Biology of Cells\*\* Credit Hours: (3) and
- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1) or
- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3) and
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1)

### List 2

- PHYS 1010 Introductory Physics Credit Hours: (3)
- PHYS 1001 Introductory Physics Lab Credit Hours: (1)
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)
- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1103 The Human Planet Credit Hours: (4)

### Related Liberal Studies (8 hours):

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)
- ART 3411 Art for Children Credit Hours: (3)

### The Major (30 hours)

Core (24 hours):

- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- SPED 3803 Classroom/Behavior Management Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- EDPR 4301 Early Child Dev/Begin Teacher Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- LITL 4240 Literacy in Grades K-4 Credit Hours: (3)
- ECED 3555 Obsrv/Assmnt Infant/Erly Ch Credit Hours: (3)

Select One Course From Each of the Following Two Areas:

Race and Ethnicity:

- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

#### Family/Culture/Gender:

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4411 Urban Anthropology Credit Hours: (3)
- HIST 4863 History/Childhood in America \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3) or
- SOCI 4460 Black/White Women in South Credit Hours: (3)

### Pre-Residency Semester (15 hours) offered in spring

Early Childhood Education (Grades PreK-3 Licensure) must take

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ECED 4500 Emergent Literacy/Lang Dev Credit Hours: (3) \*
- ECED 4005 Fam/Sch Collaboration/ECED Credit Hours: (3) \*
- ECED 4520 Plan/Facilitn Social Lrng/Dev Credit Hours: (3) \*
- ECED 4530 Plan/Facltn Math/Science Lrng Credit Hours: (3) \*

# Residency I Semester (14 hours) offered in fall

Early Childhood Education (Grades PreK-3 Licensure) must take

- ECED 4510 Early Chld Prgms/Pr Credit Hours: (3) \*
- ECED 4515 Teach/Lrng Erly Chld Ed Credit Hours: (3) \*
- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \*
- ICL 4914 Residency I Practicum Credit Hours: (5) \*

# Residency II Semester (12 hours) offered in spring

Early Childhood Education (Grades PreK-3 Licensure) must take

- ICL 4800 Residency II Prof Seminar Credit Hours: (3) \*
- ICL 4904 Residency II Clinical Credit Hours: (9) \*

### Note

\*Requires admission to TEP.

# Typical 4-Year Human Development and Learning: PreK-3 Teacher Licensure Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities (3) \*
- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- History (3)
- Fine Arts (3) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- POLS 1030 American Government\*\* Credit Hours: (3)
- Natural Science (4) \*
- History Selective (3)

#### Semester Totals 31 hrs

### Sophomore Year

Take the CORE test once you have complete ENGL 1010, ENGL 1020, and MATH 1420.

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- Natural Science (4) \*
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- SPED 3803 Classroom/Behavior Management Credit Hours: (3)
- Race & Ethnicity Selective (3)
- ART 3411 Art for Children Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)

### Semester Totals 33 hrs

### Junior Year

TEP APPROVAL You will be delayed in graduating if you are not provisionally admitted to TEP by the end of the sophomore year and fully admitted by the end of the junior year. You must have a 3.0 GPA at this time.

- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- EDPR 4301 Early Child Dev/Begin Teacher Credit Hours: (3)
- ECED 3555 Obsrv/Assmnt Infant/Erly Ch Credit Hours: (3)
- Family/Culture/Gender Selective (3)
- ECED 4005 Fam/Sch Collaboration/ECED Credit Hours: (3)
- ECED 4520 Plan/Facilitn Social Lrng/Dev Credit Hours: (3)
- ECED 4530 Plan/Facltn Math/Science Lrng Credit Hours: (3)
- ECED 4500 Emergent Literacy/Lang Dev Credit Hours: (3)
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

- ECED 4510 Early Chld Prgms/Pr Credit Hours: (3)
- ECED 4515 Teach/Lrng Erly Chld Ed Credit Hours: (3)
- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3)
- ICL 4914 Residency I Practicum Credit Hours: (5)
- ICL 4904 Residency II Clinical Credit Hours: (9)
- ICL 4800 Residency II Prof Seminar Credit Hours: (3)

Semester Totals 26 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Integrative Studies, Secondary Math Concentration (B.S.Ed.)

Program objectives for a B.S.Ed. in Integrative Studies are: (a) to understand how learning occurs, how students construct knowledge and acquire skills, and knows how to provided learning opportunities that support their intellectual, social, and personal development; (b) to adapt instructional techniques to youth of diverse cultural and language backgrounds and to students who have exceptional learning needs.

Integrative Studies/Secondary Math Concentration: Program objectives for a B.S.Ed. in Integrative Studies/Secondary Math are: (a) to understand how learning occurs, how students construct knowledge and acquire skills, and knows how to provided learning opportunities that support their intellectual, social, and personal development; (b) preparing, through intensive clinical experiences, highly qualified math teachers grades 6-12.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

NOTE: The following University General Education Program requirements are specified by the department for this major:

### Mathematics (3 hours):

- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Humanities/Fine Arts (9 hours):

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Select one Fine Arts:

- ART 1030 Intro to Art\*\* Credit Hours: (3) or
- MUS 1030 Introduction to Music\*\* Credit Hours: (3) or
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)

Select an aditional Fine Arts or one of these courses:

- CLAS 2481 Mythology \*\* Credit Hours: (3)
- PHIL 1101 Intro to Philosophy Credit Hours: (3) or
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3) or
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)

### History (6 hours):

- HIST 1110 World History to 1500\*\* Credit Hours: (3) -or-
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- HIST 2010 U S to 1877 Credit Hours: (3)
   -or-
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3)
   -or-
- HIST 2030 Tennessee History\*\* Credit Hours: (3)

Social/Behavioral Sciences (6 hours):

- POLS 1030 American Government\*\* Credit Hours: (3) plus
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)

### Natural Sciences (8 hours):

One biological science plus lab from:

- BIOL 1010 Biology of Cells\*\* Credit Hours: (3)
- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1) or
- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3)
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1) One physical science plus lab from:
- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1103 The Human Planet Credit Hours: (4)
- PHYS 1010 Introductory Physics Credit Hours: (3)
- PHYS 1001 Introductory Physics Lab Credit Hours: (1)
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)
- CHEM 1010 Chemistry of Materials\*\* Credit Hours: (3)
- CHEM 1011 Chemistry of Materials Lab \*\* Credit Hours: (1)
- CHEM 1020 Chemistry of Life Credit Hours: (3)
- CHEM 1021 Chemistry of Life Lab Credit Hours: (1)

### Secondary Math (grades 6-12)

The purpose of the Secondary Math Concentration is to prepare classroom teachers for the teaching of mathematics in grades 6-12.

### Related Liberal Studies (15 hours):

- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)

### Major Core (26 hours)

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- MATH 3581 College Geometry Credit Hours: (3)
- MATH 4151 History of Mathematics Credit Hours: (3)
- MATH 4082 Math/Mid School Teacher Credit Hours: (3)
- MATH 4080 Math/Sec School Teachers | Credit Hours: (3) \*
- MATH 4081 Math/Sec School Teachers II Credit Hours: (3) \*

### Professional Education (38 hours below)

Requires admission to TEP. An application for the Residency Program must be submitted during your Pre-Residency Semester (by the first Tuesday in March) in Ball Hall Room 204. Application may be found here.

### PreResidency (12 hours)

Requires admission to TEP:

- LITL 4241 Literacy in Grades 4-8 Credit Hours: (3)
- ICL 4004 Teach Mid Grade/Math Credit Hours: (3)
- ICL 4080 Math Methods High School I Credit Hours: (3)
- ICL 4081 Math Methods HS Teachers II Credit Hours: (3)

Residency I Semester (14 hours) offered in Fall:

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ICL 4007 Curriculum/Instr Sec Math Credit Hours: (3)
- ICL 4008 Teaching Math in Urban Schools Credit Hours: (3)
- ICL 4914 Residency I Practicum Credit Hours: (5)

Residency II Semester (12 hours) offered in Spring:

- ICL 4907 Stdnt Tchng/Secondary School Credit Hours: (2-10)
- ICL 4800 Residency II Prof Seminar Credit Hours: (3)

### Typical 4-Year Sequence for ITGS: Secondary (6-12) Math Licensure

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- POLS 1030 American Government\*\* Credit Hours: (3)
- Fine Arts (3)
- Humanities (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- US History (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- Natural Science (4)

#### Semester Totals 35 hrs

### Sophomore Year

Take the CORE once you have completed ENGL 1010, ENGL 1020, and MATH 1530.

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- History (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)

- IDT 3600 Technology in Education Credit Hours: (3)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- BIOL 1010 Biology of Cells\*\* Credit Hours: (3)
- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1)

#### Semester Totals 29 hrs

#### Junior Year

TEP APPROVAL You will be delayed in graduating if you are not provisionally admitted to TEP by the end of the sophomore year and fully admitted by the end of the junior year. You must have a 3.0 GPA at this time.

- MATH 4151 History of Mathematics Credit Hours: (3)
- ICL 4004 Teach Mid Grade/Math Credit Hours: (3) \*
- MATH 4082 Math/Mid School Teacher Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- LITL 4241 Literacy in Grades 4-8 Credit Hours: (3) \*
- ICL 4080 Math Methods High School | Credit Hours: (3) \*
- ICL 4081 Math Methods HS Teachers II Credit Hours: (3) \*
- MATH 4080 Math/Sec School Teachers | Credit Hours: (3)
- MATH 3581 College Geometry Credit Hours: (3)
- MATH 4081 Math/Sec School Teachers II Credit Hours: (3)

#### Semester Totals 31 hrs

#### Senior Year

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ICL 4007 Curriculum/Instr Sec Math Credit Hours: (3)
- ICL 4008 Teaching Math in Urban Schools Credit Hours: (3)
- ICL 4914 Residency | Practicum Credit Hours: (5)
- ICL 4907 Stdnt Tchng/Secondary School Credit Hours: (2-10)
- ICL 4800 Residency II Prof Seminar Credit Hours: (3)

#### Semester Totals 26 hrs

### Total: 120 hours

\* TEP restricted-Students should be provisionally admitted to TEP by the end of the sophomore year and full admitted by the end of junior year and have a 3.0 GPA.

\*\*Take the CORE once you have completed ENGL 1010, ENGL 1020, and MATH 1530

# **Integrative Studies, Youth Services Concentraton (B.S.Ed.)**

The Integrative Studies Youth Services concentration, a non-licensure concentration, does not require admittance to the Teacher Education Program (TEP), It does, however, require a 2.25 grade point average, C- or better in all courses in the major, and 45 upper-division hours for graduation.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

NOTE: The following University General Education Program requirements are specified by the department for this major:

### Mathematics (3 hours):

- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Humanities/Fine Arts (9 hours):

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Select one Fine Arts:

- ART 1030 Intro to Art\*\* Credit Hours: (3) or
- MUS 1030 Introduction to Music\*\* Credit Hours: (3) or
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)

Select an aditional Fine Arts or one of these courses:

- CLAS 2481 Mythology \*\* Credit Hours: (3)
- PHIL 1101 Intro to Philosophy Credit Hours: (3) or
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3) or
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)

### History (6 hours):

- HIST 1110 World History to 1500\*\* Credit Hours: (3) -or-
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- HIST 2010 U S to 1877 Credit Hours: (3)
   -or-
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3)
   -or-
- HIST 2030 Tennessee History\*\* Credit Hours: (3)

Social/Behavioral Sciences (6 hours):

- POLS 1030 American Government\*\* Credit Hours: (3) plus
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)

### Natural Sciences (8 hours):

One biological science plus lab from:

- BIOL 1010 Biology of Cells\*\* Credit Hours: (3)
- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1) or
- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3)
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1) One physical science plus lab from:
- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1103 The Human Planet Credit Hours: (4)
- PHYS 1010 Introductory Physics Credit Hours: (3)
- PHYS 1001 Introductory Physics Lab Credit Hours: (1)
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)
- CHEM 1010 Chemistry of Materials\*\* Credit Hours: (3)
- CHEM 1011 Chemistry of Materials Lab \*\* Credit Hours: (1)
- CHEM 1020 Chemistry of Life Credit Hours: (3)
- CHEM 1021 Chemistry of Life Lab Credit Hours: (1)

### Youth Services Concentration

#### Related Liberal Studies (Youth Services)

- IDT 3600 Technology in Education Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- ENGL 3500 Practical English Grammar Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

### Major Core (Youth Services)

- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- LITL 4240 Literacy in Grades K-4 Credit Hours: (3)
- SPED 4111 Intro/Appl Behav Analysis Credit Hours: (3)
- SPED 4112 Assess/Measure/Appl Behav Anly Credit Hours: (3)
- SPED 4113 Appl Behav Intervent/Strateg Credit Hours: (3)
- SPED 4114 Practitioner Issues/ABA Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- ECED 4005 Fam/Sch Collaboration/ECED Credit Hours: (3)
- LITL 3001 Literacy Tutoring Credit Hours: (3)
- EDSV 4850 Practicum/Training Settings Credit Hours: (1-3)

### Guided Electives (Youth Services)

Guided Electives (26 hours) - The following recommended:

- ECED 4500 Emergent Literacy/Lang Dev Credit Hours: (3)
- ECED 4510 Early Chld Prgms/Pr Credit Hours: (3)

- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PADM 4412 Neighborhood Dev/Social Entrep Credit Hours: (3)
- EDSV 4950 Internship/Training Settings Credit Hours: (3-12)

### Typical 4-Year Sequence for ITGS: Youth Services

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3) Fine Arts Selection
- HIST 1110 World History to 1500\*\* Credit Hours: (3) or
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- POLS 1030 American Government\*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- American History
- Humanities Selection

#### Semester Totals 30 hrs

#### Sophomore Year

- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) -or-
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science & Lab
- ENGL 3500 Practical English Grammar Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- ESCI 1301 or 1401
- Natural Science & Lab

#### Semester Totals 31 hrs

#### Junior Year

- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- LITL 4240 Literacy in Grades K-4 Credit Hours: (3)
- SPED 4111 Intro/Appl Behav Analysis Credit Hours: (3)
- SPED 4113 Appl Behav Intervent/Strateg Credit Hours: (3)
- ECED 4005 Fam/Sch Collaboration/ECED Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- SPED 4112 Assess/Measure/Appl Behav Anly Credit Hours: (3)
- SPED 4114 Practitioner Issues/ABA Credit Hours: (3)
- EDSV 4850 Practicum/Training Settings Credit Hours: (1-3)

#### Semester Totals 30 hrs

### Senior Year

- EDSV 4950 Internship/Training Settings Credit Hours: (3-12)
- LITL 3001 Literacy Tutoring Credit Hours: (3)
- Elective (3)
- Elective (3)
- EDSV 4950 (6) Internship
- Elective (3)
- Elective (3)
- Elective (2)

### Semester Totals 29 hrs

### Total: 120 Hours

# Interior Architecture, (B.F.A.)

The Bachelor of Fine Arts with a major in Interior Architecture is a professional degree and is accredited by the Council for Interior Design Accreditation (CIDA).

**NOTE:** All applicants seeking admission to the B.F.A. with a major in Interior Architecture must complete and submit to the Department of Architecture an application form, a writing assignment, and a portfolio of five representative works. These three components comprise the Entrance Evaluation and will be reviewed by a faculty committee. Applicants are accepted on the basis of potential in the field of Interior Design. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any Architecture courses for which a permit is required beyond first semester, first year is based upon this review. Contact the Department of Architecture for details and deadline.

Students transferring from another major or another institution who intend to pursue a B.F.A. degree with a major in Interior Architecture must complete the Department of Architecture Entrance Evaluation. Transfer students seeking advanced standing in the Interior Architecture major should submit a portfolio of work representing previously completed Interior Architecture studio work. The review committee will determine if the portfolio work is equivalent to comparable courses at the University of Memphis. Placement in the major is dependent upon the review. Even if admitted to advanced standing, the student may be required to remedy previous course deficiencies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note: the following are specified by the department for this program:

### Social/Behavioral Sciences:

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3) and
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

### Natural Science:

Select two of the following:

- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4) plus lab

#### Humanities:

- ARTH 2010 World Art | Credit Hours: (3) and
- ARTH 2020 World Art II Credit Hours: (3)

### History:

- HIST 1110 World History to 1500\*\* Credit Hours: (3) and
- HIST 1120 World History since 1500\*\* Credit Hours: (3)

### Mathematics:

• MATH 1710 - College Algebra Credit Hours: (3)

### The Major (79 hours)

### Major Foundations Core (32 hours)

- ARCH 1111 Fundamentals of Design Studio Credit Hours: (3)
- ARCH 1112 Architecture Graphics Studio Credit Hours: (3)
- ARCH 1113 Design Visualization Credit Hours: (3)
- ARCH 1120 Intro to Architecture + Design Credit Hours: (3)
- ARCH 1211 History of Architecture 1 Credit Hours: (3)
- ARCH 2212 History of Architecture 2 Credit Hours: (3)
- ARCH 2411 Building Technology 1 Credit Hours: (3)
- ARCH 2412 Building Technology 2 Credit Hours: (3)
- ARCH 2611 Computer Apps in Design 1 Credit Hours: (3)
- ARCH 2711 Design Studio 1 Credit Hours: (5)

### The Major

### Entrance - Completion of Major Core (30 hours)

Candidacy Review and Portfolio Requirements - A Candidacy Review Portfolio is required of all students intending to major in Interior Architecture. Admission to the University of Memphis and completion of the major core do not guarantee placement in the program. Admission is selective and is based on a portfolio evaluation reflecting professional standards and expectations of the major. A portfolio that includes but is not limited to works from the major core courses is required as part of the application. Guidelines and application forms for admission for the Interior Architecture major are available in the department office. Consultation with a faculty advisor is recommended before or during portfolio preparation. Students may submit portfolios for review no earlier than the semester that Candidacy requirements are being completed.

Transfer students must meet entrance requirements of the major. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any 3000-4000 level Architecture course is based upon this review.

# Completion of Major (46 hours)

- ARCH 2612 Computer Apps in Design 2 Credit Hours: (3)
- ARCH 2712 Design Studio 2 Credit Hours: (5)
- ARCH 3213 Survey of Interiors+Furniture Credit Hours: (3)
- ARCH 3421 Environmental Systems Credit Hours: (3)
- ARCH 3431 Professional Practice Credit Hours: (3)
- ARCH 3613 Computer Apps in Design 3 Credit Hours: (3)
- ARCH 3713 Design Studio 3 Credit Hours: (5)
- ARCH 3714 Design Studio 4 Credit Hours: (5)
- ARCH 4421 Sustainable Design Credit Hours: (3)
- ARCH 4441 Construction Documents Credit Hours: (3)
- ARCH 4715 Design Studio 5 Credit Hours: (5)
- ARCH 4716 Design Studio 6 Credit Hours: (5)

### Electives (1-3 hours)

Architecture upper division (3/4000 level) elective to complete the 79 semester hours of Architecture course work. See advisor for details.

### Typical 4-Year Interior Architecture Sequence

### Freshman Year

- ARCH 1112 Architecture Graphics Studio Credit Hours: (3)
- ARCH 1120 Intro to Architecture + Design Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- ARCH 1111 Fundamentals of Design Studio Credit Hours: (3)
- ARCH 1113 Design Visualization Credit Hours: (3)
- ARCH 1211 History of Architecture 1 Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- MATH 1710 College Algebra Credit Hours: (3)

#### Semester Totals 36 hrs

#### Sophomore Year

- ARCH 2212 History of Architecture 2 Credit Hours: (3)
- ARCH 2411 Building Technology 1 Credit Hours: (3)
- ARCH 2611 Computer Apps in Design 1 Credit Hours: (3)
- ARCH 2711 Design Studio 1 Credit Hours: (5)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ARCH 2412 Building Technology 2 Credit Hours: (3)
- ARCH 2612 Computer Apps in Design 2 Credit Hours: (3)
- ARCH 2712 Design Studio 2 Credit Hours: (5)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*

#### Semester Totals 31 hrs

### Junior Year

- ARCH 3421 Environmental Systems Credit Hours: (3)
- ARCH 3613 Computer Apps in Design 3 Credit Hours: (3)
- ARCH 3713 Design Studio 3 Credit Hours: (5)
- ARTH 2010 World Art I Credit Hours: (3)
- ARCH 3213 Survey of Interiors+Furniture Credit Hours: (3)
- ARCH 3431 Professional Practice Credit Hours: (3)
- ARCH 3714 Design Studio 4 Credit Hours: (5)
- ARTH 2020 World Art II Credit Hours: (3)

### Semester Totals 28 hrs

### Senior Year

- ARCH 4441 Construction Documents Credit Hours: (3)
- ARCH 4715 Design Studio 5 Credit Hours: (5)
- ARCH elective\*\*\* (3)
- Natural Science\*\* (4)
- ARCH 4421 Sustainable Design Credit Hours: (3)
- ARCH 4716 Design Studio 6 Credit Hours: (5)
- Natural Science\*\* (4)

### Semester Totals 25-27 hrs

### Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement.

\*\*Natural \*\*Science (8 Credit hours required): ESCI 1010, ESCI 1020, ESCI 1040 (Must take 2 of these 3)

\*\*\*Elective must be 3000-4000 level with ARCH prefix.

A minimum of 42 upper division hours in the major required.

# International and Global Studies, (B.A.)

The International and Global Studies (B.A.) program provides the opportunity to bring the knowledge of several traditional disciplines to bear upon a focal point of human relationships and problems that cross national and cultural boundaries. The program objectives are designed to serve the student who seeks knowledge of the range of contemporary and possible future problems that confront international society and an understanding of alternative national and cultural perspectives on solutions to those problems. The program also serves the needs of students planning a career in the Foreign Service or related agencies of the federal government and students preparing for employment abroad in the private sector, or in international organizations, private or public. The program objectives are to: (a) learn key issues of contention related to the international system; (b) learn central economic, historical, cultural, geographical, and political concepts related to the study of the international system; (c) demonstrate competency in at least one modern foreign language; (e) be able to conduct and present scholarly research on international issues; (f) complete at least one internationally-related experiential learning activity.

The program emphasis is on the course work in history, political science, economics, anthropology, and geography, with contributions from other social science disciplines and art. Within the program, the student is required to concentrate a part of the work in the field of American foreign policy or in one of five areas of the world. Students are encouraged to pursue the study of a foreign language and to seek opportunities for travel and study abroad. The student's program should be planned in consultation with the Director or Associate Director of International and Global Studies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the following are required as prerequisites for upper-division courses in the International and Global Studies major: Social Science:

- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (39 hours)

Core requirements (27 hours)

Lower Division Core (6 hours)

Select one (1) from the following:

- POLS 1501 International Relations\*\* Credit Hours: (3)
- INTL 1101 Introduction to International and Global Studies Credit Hours: (3)

Select one (1) from the following (unless taken to satisfy previous requirement)

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ECON 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3)
- INTL 1101
- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 1501

### Upper Division Core (21 hours)

Global Studies (Select 9 hours from the following 4 courses)

- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- ESCI 4252 Global Environmental Change Credit Hours: (3)
- HIST 4260 World since 1945 Credit Hours: (3)
- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)

#### International Political, Economic, and Development Processes - Select 9 hours from at least 2 disciplines

- ANTH 3500 Anth of Global Health \*\* Credit Hours: (3)
- ANTH 4415 Anthropology Human Rights Credit Hours: (3)
- ANTH 4416 Culture/Identity/Power Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- ENGL 4442 Studies in World Literature Credit Hours: (3)
- ENGL 4521 Language and Society \*\* Credit Hours: (3)

- ESCI 4430 Economic Geography Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)
- SOCI 2100 Sociology of Globalization Credit Hours: (3)
- UNIV 3550 Clash of Cultures Credit Hours: (3) Note that courses taken here cannot be double-counted for concentration credit hours

#### Seminar

• INTL 4601 - Seminar in International and Global Studies Credit Hours: (3)

### Concentration (9 hours)

#### **Global Studies**

Global Studies students gain functional expertise in one of the following areas of emphasis: (1) Conflict, Peace, and Human Rights, (2) Global Governance & Political Economy (3) International Development & Environmental Sustainability, (4) Global Health & Ethics, or (5) Global Communication, Administration, & Management. Students choose credits in at least 2 disciplines in consultation with their advisor from the following:

- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ANTH 3500 Anth of Global Health \*\* Credit Hours: (3)
- ANTH 4415 Anthropology Human Rights Credit Hours: (3)
- ANTH 4416 Culture/Identity/Power Credit Hours: (3)
- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- ANTH 4551 Culture/Sex/Childbirth Credit Hours: (3)
- CJUS 2110 Comparative Justice System Credit Hours: (3)
- CJUS 4190 Terrorism Soc/Legl Prsp \*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- ENGL 4442 Studies in World Literature Credit Hours: (3)
- ENGL 4511 Language and Literature \*\* Credit Hours: (3)
- ENGL 4521 Language and Society \*\* Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- ENGL 4532 Skills/App/Assess ESL \*\* Credit Hours: (3)
- ESCI 4252 Global Environmental Change Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- HIST 3803 American Diplomatic History \*\* Credit Hours: (3)
- HIST 3811 U S Military/Naval History\*\* Credit Hours: (3)
- HIST 3815 World War II Credit Hours: (3)
- HPRM 4400 International Hospitality Credit Hours: (3)
- JDST 4511 Holocaust Studies Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PADM 4227 Issues/Nonprofit Admin Credit Hours: (3)

- PADM 4401 Comparative Public Adm\*\* Credit Hours: (3)
- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- POLS 3310 Politics/Developed World Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3340 Power/Politics/State Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- POLS 3506 American Foreign Policy \*\* Credit Hours: (3)
- POLS 3507 Terrorism \*\* Credit Hours: (3)
- POLS 4315 Revolution/Political Violence Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)
- POLS 4506 Prob American Foreign Policy Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- SLS 4165 Sport/Global City Credit Hours: (3)
- SLS 4175 Internationl Persp Sport Mgmt Credit Hours: (3)
- UNIV 4511 Holocaust Studies Credit Hours: (3)

#### Area Studies

Choose 3 courses in at least 2 disciplines in consultation with academic advisor. (9 credits)

- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ANTH 3242 Peoples of Africa Credit Hours: (3)
- CHIN 3402 Readings in Chinese Culture Credit Hours: (3)
- CHIN 4301 Modern Chinese Fiction Credit Hours: (3)
- CHIN 4304 Advanced Chinese | Credit Hours: (3)
- CHIN 4305 Advanced Chinese II Credit Hours: (3)
- CHIN 4501 Intro to Chinese Linguistics Credit Hours: (3)
- CJUS 2110 Comparative Justice System Credit Hours: (3)
- CLAS 2481 Mythology \*\* Credit Hours: (3)
- ENGL 3220 British Lit since 1750 \*\* Credit Hours: (3)
- ENGL 4442 Studies in World Literature Credit Hours: (3)
- ENGL 4511 Language and Literature \*\* Credit Hours: (3)
- ENGL 4521 Language and Society \*\* Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- ENGL 4532 Skills/App/Assess ESL \*\* Credit Hours: (3)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- ESCI 4307 Thematic Studies/China Credit Hours: (3)
- FREN 3401 French Civilization Credit Hours: (3)
- FREN 3791 French for Commerce | Credit Hours: (3)
- FREN 3900 French Culture and Society Credit Hours: (3-6)
- FREN 4415 Francophone Literature Credit Hours: (3)
- FREN 4780 Individual Study French Credit Hours: (1-3)
- FREN 4801 Cont France/Francophone World Credit Hours: (3)
- GERM 3411 Intro German Lit and Culture I Credit Hours: (3)
- GERM 3412 Intro Germ Lit and Culture II Credit Hours: (3)
- GERM 3791 Business German | Credit Hours: (3)

- GERM 3792 Business German II Credit Hours: (3)
- GERM 4443 German Writers 20th Century Credit Hours: (3)
- GERM 4451 German Drama Credit Hours: (3)
- GERM 4465 German Narrative Prose Credit Hours: (3)
- GERM 4466 German Poetry Credit Hours: (3)
- GERM 4480 Goethe Credit Hours: (3)
- GERM 4501 Teaching German Pedagogy Credit Hours: (3)
- HIST 3211 Latin American History to 1808 Credit Hours: (3)
- HIST 3212 Latin American History since 1808 Credit Hours: (3)
- HIST 3273 Islamic History to 1405 Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- HIST 3282 History of Africa since 1500 Credit Hours: (3)
- HIST 3291 Modern Asia Credit Hours: (3)
- HIST 3302 Modern Europe 1800-Present \*\* Credit Hours: (3)
- HIST 3815 World War II Credit Hours: (3)
- HIST 4145 History of Modern Germany Credit Hours: (3)
- HIST 4162 Russia after 1917 Credit Hours: (3)
- HIST 4213 Women/Gender/Latin America Credit Hours: (3)
- HIST 4221 20th Century Latin Amer Rev Credit Hours: (3)
- HIST 4222 Race/Class in Latin America Credit Hours: (3)
- HIST 4272 Modern Middle East \*\* Credit Hours: (3)
- HIST 4283 History/South Africa Credit Hours: (3)
- HIST 4288 West Africa/Diaspora \*\* Credit Hours: (3)
- HIST 4292 Modern China 1800-Present \*\* Credit Hours: (3)
- HIST 4294 Modern Japan 1800-Present \*\* Credit Hours: (3)
- HIST 4461 Europe in the Age of Total War, 1914-1945 Credit Hours: (3)
- ITAL 3311 Adv Conversation/Composition | Credit Hours: (3)
- ITAL 3312 Adv Conversation/Composition II Credit Hours: (3)
- ITAL 3411 Intro to Italian Literature Credit Hours: (3)
- ITAL 3900 Italian Culture and Society Credit Hours: (3-6)
- JAPN 3401 Intro to Japanese Literature Credit Hours: (3)
- JAPN 3402 Readings/JAPN Culture Credit Hours: (3)
- JAPN 3900 Japan Culture/Society Credit Hours: (3-6)
- JAPN 4401 Advanced Japanese | Credit Hours: (3)
- JAPN 4402 Advanced Japanese II Credit Hours: (3)
- JAPN 4701 Japn/Professional Purpose | Credit Hours: (3)
- LALI 4442 Italian Cinema Credit Hours: (3)
- PHIL 3721 Chinese Philosophy Credit Hours: (3)
- POLS 3302 West Europe Govt/Politics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3309 Govt/Politics of Mid East \*\* Credit Hours: (3)
- POLS 3310 Politics/Developed World Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)
- PORT 4024 Brazilian Short Story Credit Hours: (3)
- SPAN 3312 Adv Conversation Credit Hours: (3)
- SPAN 3313 Advanced Composition Credit Hours: (3)
- SPAN 3550 Latin America Country & People\*\* Credit Hours: (3)
- SPAN 4306 Applied Span Linguistics Credit Hours: (3)
- SPAN 4410 Spanish Lit and Civilization Credit Hours: (3)
- SPAN 4431 Contemporary Spanish Prose Credit Hours: (3)
- SPAN 4432 Contemp Spanish Poetry/Drama Credit Hours: (3)
- SPAN 4510 Spanish Amer Lit/Civilization Credit Hours: (3)
- SPAN 4561 Pre-Contemp Span Amer Fiction Credit Hours: (3)

- SPAN 4562 Contemporary Span Amer Fiction Credit Hours: (3)
- SPAN 4563 Hispanic Literature Genres Credit Hours: (3)
- SPAN 4701 Spanish for Commerce | Credit Hours: (3)
- SPAN 4702 Spanish for Commerce II Credit Hours: (3)
- SPAN 4703 Languages/Cultures/Communities Credit Hours: (3)
- UNIV 4511 Holocaust Studies Credit Hours: (3)

### Foreign Language (6 hours)

In addition to the Bachelor of Arts language requirement, completion of an additional six hours in that same language at the 3000 level or higher.

### **Experiential Activity**

Students are required to complete an international or experiential learning experience. This may be fulfilled through participation in a formal education abroad program or through foreign based work, service, or internship activities. A U.S.-based experience of an international nature or prior international experience may be considered. This experience must be approved by the Director.

# Electives (21-22 hours)

Electives may be chosen to bring the total number of hours to 120.

### Typical 4-Year International and Global Studies Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Elective (3)
- Foreign Language/B.A. (3)
- MATH (3-4) \*
- POLS 1501 International Relations\*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Lower Division Core Selection (3)
- Foreign Language/B.A. (3)
- Humanities/Fine Arts (3) \* Elective (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

- History (3) \*
- Social/Behavioral Science (if needed) (3)
- Natural Science (4) \*
- UD Foreign Language (3)
- Fine Arts (3) \*
- Elective (3)
- Natural Science (4) \*
- UD Foreign Language (3)
- History (3) \*

• COMM 2381 - Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Upper Division Core Selection (3)
- UD Elective (3)
- Upper Division Core Selection (3)
- Inter. Processes (3)
- Upper Division Core Selection (3)
- UD Elective (3)
- Inter. Processes (3)
- Inter. Processes (3)
- Elective (3)

#### Semester Totals 30 hrs

#### Senior Year

- INTL 4601 Seminar in International and Global Studies Credit Hours: (3)
- INTL conc. elective (3)
- UD elective (3)
- UD elective (3)
- Elective (3)
- INTL conc. elective (3)
- UD elective (3)
- Elective (4)
- INTL conc. elective (3)

#### Semester Totals 28 hrs

### Total Hours: 120-121

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **International Business, (B.B.A.)**

The International Business major prepares undergraduate business students for entry-level careers in international business fields through a broad, interdisciplinary curriculum that combines theoretical and practical international business study with course work in the liberal arts, including foreign language and area studies.

210 For further information concerning this program, contact the International Business advisor or The Fogelman College of Business and Economics Advising Office.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

### The Major (27 hours)

### Foreign Language:

6 semester hours in one modern foreign language at or above the 2000 level or equivalent.

### Choose 4 International Business Courses From the Following (12 hours):

- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)

### Choose 2 Additional Courses From the Following (6 hours):

- BA 4911 Internship International Business Credit Hours: (1-6)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)

### Choose 1 (3 hours):

- BA 4911 Internship International Business Credit Hours: (1-6)
- BA 4910 Independent Study in International Business Credit Hours: (1-3)
- Study Abroad

### Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120. See International Business advisor for recommended electives in global and area studies.

### Typical 4-Year International Business Sequence:

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Foreign Language (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3) \*
- Foreign Language (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

Elective (3)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- Foreign Language (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Foreign Language (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Natural Science (4) \*

#### Semester Totals 32 hrs

#### Junior Year

- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) Major elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- FIR 3410 Financial Management \*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Senior Year

- Major elective (3)
- Major elective (3)
- History (3) \*
- Major elective (3)
- Major requirement (3)
- Major elective (3)
- History (3) \*
- Elective (1-3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Major elective (3)

Semester Totals 28 - 30 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Journalism (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# Journalism and Strategic Media Core (18 hours)

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours):

- JRSM 4702 Media, Diversity & Society \*\* Credit Hours: (3)
- JRSM 4704 Issues in Sport and Media Credit Hours: (3)
- JRSM 4708 Media Ethics Credit Hours: (3)
- JRSM 4716 Media History Credit Hours: (3)
- JRSM 4720 Presidents and the Press Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours):

- JRSM 4930 Media Internship \*\* Credit Hours: (3)
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)

### Journalism Major Core (30 hours):

### Journalism Core (15 hours)

- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- JOUR 4998 Multimedia News Lab Credit Hours: (3)
- ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (6)Note: Strongly encouraged to be a second internship. Must be approved by advisor.

### Additional Core Requirements (15 hours):

One of the following: (3 hours)

- JOUR 3120 Reporting Credit Hours: (3)
- JOUR 3629 Broadcast Reporting Credit Hours: (3) *Two of the following: (6 hours)*
- JOUR 3130 Feature Writing/Reporting \*\* Credit Hours: (3)
- JOUR 4124 Data Writing/Reporting Credit Hours: (3)
- JOUR 4150 Sports Writing/Reporting Credit Hours: (3)
- JOUR 4160 Food Writing/Reporting Credit Hours: (3)
- JOUR 4170 Business Writing/Reporting Credit Hours: (3)
- JOUR 4180 Public Issues Writing/Reporting Credit Hours: (3)
- JOUR 4190 Opinion Writing/Reporting Credit Hours: (3)
- JOUR 4629 TV News Writing/Reporting Credit Hours: (3)
- JOUR 4155 Multimedia Sports Reporting Credit Hours: (3) Two of the following: (6 hours)
- JOUR 4530 Innovative Storytelling Techniques Credit Hours: (3)
- JOUR 4639 TV News Producing Credit Hours: (3)
- CRMM 4140 Publication Design Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- CRMM 4526 Advanced Photojournalism Credit Hours: (3)
- CRMM 4550 Web Publish II: html/CSS Credit Hours: (3)
- CRMM 4920 Information Design Credit Hours: (3)

### Electives

Completion of courses to bring the total to 120 semester hours.

### Typical 4-Year Journalism Sequence

### Freshman Year

- JRSM 1700 Intro to Media \*\* Credit Hours: (3) \*\*
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences (3) \*
- ENGL 1010 English Composition\*\* Credit Hours: (3)

- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Humanities/Fine Arts (3) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- JOUR 3120 Reporting Credit Hours: (3)
- Foreign Language/B.A. (3)
- History (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Natural Science (4) \*
- Foreign Language/B.A. (3)
- MATH (3) \*
- JOUR writing elective (3)

### Semester Totals 31 hrs

### Junior Year

- Non-JRSM Elective (Minor) (3)
- JOUR writing elective (3)
- JOUR production elective (3)
- History (3)
- Natural Science\* (4)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ADVR/JOUR/JRSM/PBRL elective (3)
- JOUR production elective (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)

#### Semester Totals 30-31 hrs

### Senior Year

- JRSM 4700 Media Law \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (1)
- JOUR 4998 Multimedia News Lab Credit Hours: (3)
- JRSM 4930 Media Internship \*\* Credit Hours: (3) or
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)
   The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- UD JRSM Elective (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)

#### Semester Totals 28 hrs

### Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# Journalism - Creative Mass Media Concentration, (B.A.)

# University General Education Program (41 hours)

See University General Education Program for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

### Journalism and Strategic Media Core (18 hours)

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours):

- JRSM 4702 Media, Diversity & Society \*\* Credit Hours: (3)
- JRSM 4704 Issues in Sport and Media Credit Hours: (3)
- JRSM 4708 Media Ethics Credit Hours: (3)
- JRSM 4716 Media History Credit Hours: (3)
- JRSM 4720 Presidents and the Press Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours):

- JRSM 4930 Media Internship \*\* Credit Hours: (3)
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)
   The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# Creative Mass Media Concentration (30 hours)

# Concentration Core (15 hours):

- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- ADVR 3324 Creative Strategy Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- CRMM 4900 Creative Media Lab Credit Hours: (3)

### Select three of the following (9 hours):

- ADVR 4328 Strategic Adv Campaigns Credit Hours: (3)
- CRMM 4140 Publication Design Credit Hours: (3)
- CRMM 4220 Print Communication Design Credit Hours: (3)
- CRMM 4526 Advanced Photojournalism Credit Hours: (3)
- CRMM 4550 Web Publish II: html/CSS Credit Hours: (3)
- CRMM 4560 Interactive Media Design Credit Hours: (3)
- CRMM 4920 Information Design Credit Hours: (3)

### Concentration Elective (6 hours):

• ADVR/JOUR/JRSM/PBRL ELECTIVE Credit Hours: (6) Note: Strongly encouraged to be a second internship. Must be approved by advisor.

# Art (Select one focus) 9 hours:

- Graphic Design Focus
- Photography Focus

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Typical 4-Year Creative Mass Media Sequence

### **Freshmen Year**

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- Foreign Language/B.A.
- Social Science (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- Foreign Language/B.A.
- Humanities/Fine Arts (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Sophomore Year

- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- Foreign Language/B.A.
- History (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- ADVR 3324 Creative Strategy Credit Hours: (3)
- Humanities/Fine Arts (3)
- Natural Science (4)
- Foreign Language/B.A.
- Math (3)

### Semester Totals 31 hours

### Junior Year

- Non-JRSM Elective (Minor) (3)
- CMM elective (3)
- CMM elective (3)
- History (3)
- Natural Science (3)
- COMM 2381 Oral Communication \*\*
- ADVR/JOUR/JRSM/PBRL elective (3)
- CMM elective (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)

### Semester Totals 31 hours

### Senior Year

- JRSM 4700 Media Law \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (1)
- JRSM 4930 Media Internship \*\* Credit Hours: (3) OR JRSM 4940 Student Media Practicum (3)
- CRMM 4900 Creative Media Lab Credit Hours: (3)
- UD JRSM Elective (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)

### Semester Totals 28 hours

Internship elective highly recommended in final year to enhance employability and complete minimum of 120 hours for degree.

# Total Hours required for Graduation: 120

\* Must satisy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# Liberal Studies, Asian Studies and International Trade, (B.L.S.)

See College of Professional & Liberal Studies website for additional information.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (39-51 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Foreign Language (9-21 hours)

Requirement: 9 hours at the 3000-level or above.

Students with previous background in the chosen language (Chinese or Japanese) must take the placement test to determine in what course they should enroll.

Students with no previous background in the chosen language will enroll in CHIN 1010 or JAPN 1010.

# Area Studies (6 hours)

Students must complete 6 hours from the following:

- HIST 3290 Traditional East Asia \*\* Credit Hours: (3)
- HIST 3291 Modern Asia Credit Hours: (3)
- HIST 4292 Modern China 1800-Present \*\* Credit Hours: (3)
- HIST 4294 Modern Japan 1800-Present \*\* Credit Hours: (3)

### International Economics and Business Studies (24 hours)

- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3) (Required)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3) (Required)

- FIR 3410 Financial Management \*\* Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

Recommended choices:

- ESCI 4307 Thematic Studies/China Credit Hours: (3)
- UNIV 3550 Clash of Cultures Credit Hours: (3)
- UNIV 4506 The Chinese Credit Hours: (3)

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# Recommended Electives (hours vary)

- ANTH 3200 Culture and Change around the World Credit Hours: (3) /ESCI 3200(cross listed)
- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- INTL 4601 Seminar in International and Global Studies Credit Hours: (3)
- JOUR 4712 Media and Cultures\*\* Credit Hours: (3)
- PADM 4401 Comparative Public Adm\*\* Credit Hours: (3)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)
- POLS 3310 Politics/Developed World Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- POLS 3506 American Foreign Policy \*\* Credit Hours: (3)
- POLS 3509 Contmp Prblm Intl Relation Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)
- POLS 4506 Prob American Foreign Policy Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)
- SOCI 2100 Sociology of Globalization Credit Hours: (3)
- SOCI 4413 Global Info Tech & Soc of Work Credit Hours: (3)

# Liberal Studies, Judaic Studies (B.L.S.)

Bornblum Judaic Studies explores the experience of the Jewish people within the contexts of world cultures. Non-theological in its orientation, it provides students pursuing a concentration in Judaic Studies the opportunity to study related areas, including the history of the Jewish people, the structures and politics of Jewish communities, the Hebrew and Arabic languages, and the religious, intellectual, and aesthetic traditions of the Jewish people.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (45 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Lower Division Core (15 hours)

#### Group A: Hebrew Language Core

- HEBR 1010 Elementary Hebrew | Credit Hours: (3)
- HEBR 1020 Elementary Hebrew II Credit Hours: (3)
- HEBR 2010 Intermediate Hebrew | Credit Hours: (3)
- HEBR 2020 Intermediate Hebrew II Credit Hours: (3) Group B: Religious Studies Core
- JDST 2850 Religions of Abraham Credit Hours: (3)

### Upper Division Core (6 hours)

- HIST 3275 History of Jewish People Credit Hours: (3)
- JDST 3601 Judaism Credit Hours: (3)
- JDST 3801 Ancient & Medieval Jewish Thought Credit Hours: (3)

### Upper Division Electives (15 hours)

#### Group A: Jewish Heritage (pick 2 or 3)

- ENGL 4461 Bible as Literature Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- JDST 3661 Perspectives on the Old Testament Credit Hours: (3)
- JDST 3802 Modern Jewish Thought Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- JDST 4671 Jewish Literary Texts Credit Hours: (3)
- JDST 4801 Jewish Mysticism Credit Hours: (3)
- JDST 4820 Political History of Israel Credit Hours: (3)
- JDST 4830 Israeli/Arab Conflict Credit Hours: (3)

### Interdisciplinary Electives (9 hours)

- ARTH 4121 Ancient Art Near East Credit Hours: (3)
- HIST 4272 Modern Middle East \*\* Credit Hours: (3)
- HIST 4320 Ancient Near East Credit Hours: (3)
- PHIL 3701 Human and the Divine Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- SOCI 3860 Sociology of Religion\*\* Credit Hours: (3)

# College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (25-31 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Liberal Studies, Religious Studies, (B.L.S.)

The concentration in Religious Studies is designed for students with a diversity of backgrounds and interests in religion. Students who are enrolled in the concentration may be considering employment in fields where a knowledge of different religious traditions would be an asset, such as counseling or social work, or they may be contemplating further study of religion in a theological seminary or religious studies graduate program. Religious Studies is a traditional liberal arts field that helps students to develop skills in critical thinking, the analysis of complex issues, and oral and written expression.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Religious Studies Core (12 Hours)

- RLGN 1100 Introduction to Religion \*\* Credit Hours: (3)
- RLGN 3100 Perspectives on Religion Credit Hours: (3)
- UNIV 3580 Hebrew and Greek Legacy\*\* Credit Hours: (3)
- UNIV 3581 Faith/Reason/Imagination\*\* Credit Hours: (3)

### Religious Context Courses (24 Hours)

- AAAS 4251 African Religions/Diaspora Credit Hours: (3)
- ANTH 3253 Anthropology of Religion Credit Hours: (3)
- CLAS 2481 Mythology \*\* Credit Hours: (3)
- COMM 3100 Communication Ethics \*\* Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- ENGL 4461 Bible as Literature Credit Hours: (3)
- HIST 3273 Islamic History to 1405 Credit Hours: (3)
- HIST 3274 Islamic History since 1405 Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- HIST 3320 Ancient World \*\* Credit Hours: (3)
- HIST 3370 Medieval Europe Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4276 The Arab-Israeli Conflict Credit Hours: (3)
- HIST 4320 Ancient Near East Credit Hours: (3)
- HIST 4322 The Roman World Credit Hours: (3)
- JDST 2850 Religions of Abraham Credit Hours: (3)
- JDST 3601 Judaism Credit Hours: (3)
- JDST 3661 Perspectives on the Old Testament Credit Hours: (3)
- JDST 4511 Holocaust Studies Credit Hours: (3)
- PADM 3501 Civic Engagement, Voluntarism Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations\*\* Credit Hours: (3)
- PHIL 3701 Human and the Divine Credit Hours: (3)
- PHIL 3702 Philosophy of Religion Credit Hours: (3)
- PHIL 3721 Chinese Philosophy Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- RLGN 3001 Exploring Christian History Credit Hours: (3)
- RLGN 3002 Studies In Islam and Its Cultures Credit Hours: (3)
- SOCI 3860 Sociology of Religion\*\* Credit Hours: (3)
- UNIV 3540 Ethics & Professionalism \*\* Credit Hours: (3)
- UNIV 3565 Comparative Christianity\*\* Credit Hours: (3)
- UNIV 3590 New Testament Credit Hours: (3)
- UNIV 3585 Ancient Empires & Contemporary Interpretations of the Old Testament \*\* Credit Hours: (3)
- UNIV 3592 Religious Perspectives on Death and Afterlife Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

# College Requirements (9 Hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 Hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (29-34 Hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Management - Human Resources Management Concentration, (B.B.A.)

# University General Education Program (41 hours)

See University General Education Program for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

# For Students Choosing a Major in Management With a Concentration in Human Resources Management:

A minimum of 24 upper division semester hours including

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4240 Compensation Performance Appraisal \*\* Credit Hours: (3)
- MGMT 4260 Employee Staffing/Training/Development \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4461 Managerial Leadership \*\* Credit Hours: (3)

either

- MGMT 4251 Employee Relations \*\* Credit Hours: (3)
- MGMT 3812 Managing Employee Wellness \*\* Credit Hours: (3)

#### either

- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)

and either

- MGMT 4910 Independent Study Management \*\* Credit Hours: (1-3) or
- MGMT 4911 Internship In Mgmt \*\* Credit Hours: (1-6)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Management Sequence (concentration in Human Resources Management)

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- History (3) \*
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Semester Totals 28-30 hrs

### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*

#### Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Elective (3)

### Semester Totals 32 hrs

### Junior Year

- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4240 Compensation Performance Appraisal \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)

### Semester Totals 30 hrs

# Senior Year

- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
   or
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MGMT 4260 Employee Staffing/Training/Development \*\* Credit Hours: (3)
- MGMT 4461 Managerial Leadership \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- Elective (3)
- MGMT 4251 Employee Relations \*\* Credit Hours: (3) or
- MGMT 3812 Managing Employee Wellness \*\* Credit Hours: (3)
- MGMT 4911 Internship In Mgmt \*\* Credit Hours: (1-6) or
- MGMT 4910 Independent Study Management \*\* Credit Hours: (1-3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 30 hrs

# Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Management, (B.B.A.)

# University General Education Program (41 hours)

See University General Education Program for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR

- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

# For Students Choosing a Major in Management With No Concentration:

A minimum of 24 upper division semester hours including

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4461 Managerial Leadership \*\* Credit Hours: (3) and either
- MGMT 4510 International Business Communication \*\* Credit Hours: (3) or
- MGMT 4810 International Management \*\* Credit Hours: (3)

# Additional Courses

The additional 12 hours of the 24 hour minimum for the major can be selected from the following:

- MGMT 3812 Managing Employee Wellness \*\* Credit Hours: (3)
- MGMT 4240 Compensation Performance Appraisal \*\* Credit Hours: (3)
- MGMT 4251 Employee Relations \*\* Credit Hours: (3)
- MGMT 4260 Employee Staffing/Training/Development \*\* Credit Hours: (3)

- MGMT 4481 Teamwork/Group Dynamics in Organizations Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MGMT 4820 Advanced Entrepreneurship \*\* Credit Hours: (3)
- MGMT 4910 Independent Study Management \*\* Credit Hours: (1-3)
- MGMT 4911 Internship In Mgmt \*\* Credit Hours: (1-6)

A Maximum of 6 Hours From the Following Courses:

- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3315 Hospitality Human Resource Mgmt Credit Hours: (3)
- HPRM 4350 Properties Develomnt/Planning Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Management Sequence (no concentration)

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- History (3) \*
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Semester Totals 28-30 hrs

### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*

#### Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*

- History (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Elective (3)

### Semester Totals 32 hrs

### Junior Year

- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT elective (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

### Senior Year

- MGMT 4510 International Business Communication \*\* Credit Hours: (3) or
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MGMT elective (3)
- MGMT 4461 Managerial Leadership \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- Elective (3)
- MGMT elective (3)
- MGMT elective (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 30 hrs

# Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Marketing Management, (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

### A Minimum of 24 Upper Division Semester Hours in Marketing Courses as Follows:

- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- MKTG 4550 MKTG Business Solutions for Sustainability Credit Hours: (3)
- MKTG 4901 Management of Marketing Strategies \*\* Credit Hours: (3)

and either

- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3) or
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)

### Three Semester Hours Chosen by the Student From the Following:

- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4230 Services Marketing Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- MKTG 4911 Marketing Internship Credit Hours: (1-6)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Marketing Management Sequence:

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Humanities/Fine Arts (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Semester Totals 28-30 hrs

### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*

- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- History (3) \*
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Natural Science (4) \*

### Semester Totals 32 hrs

### Junior Year

- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- MKTG major elective (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Senior Year

- History (3) \*
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
   or
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- Elective (3)
- MKTG 4901 Management of Marketing Strategies \*\* Credit Hours: (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)
- MKTG 4550 MKTG Business Solutions for Sustainability Credit Hours: (3)

### Semester Totals 30 hrs

Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Mathematical Sciences - (B.S.)

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the The online catalog can be accessed at: http://catalog.memphis.edu/index.php

concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

# Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

# The Major (53-54 hours)

Major Core (32-33 hours):

### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) OR
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

#### Completion of:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)

#### and either

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 4001 Intro to Python Programming Credit Hours: (3)

# Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4082, and MATH 4611

Alternatively, students may choose from the following concentrations.

- Mathematical Sciences Statistics Concentration, (B.S.) (21 hours)
- Mathematical Sciences Data Science Concentration, (B.S.) (22 hours)

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student **may not** enroll in MATH 3402 without having previously completed MATH 2422.

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

• In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411.

• Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, and MATH 2120 for prerequisite and graduation purposes.

• The Honors student must take MATH 4402 - Honors Thesis Seminar.

• Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

• A GPA of 3.50 in all MATH courses must be maintained.

Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

# Typical 4-Year Mathematics Major Sequence

### Freshman Year

#### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Social/Behavioral Sciences\* (3)
- Elective (3)
- Elective (3)

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- Natural Science<sup>+</sup> (4)
- Elective (3)

# Sophomore Year

#### First Semester

- History\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- Natural Science<sup>+</sup> (4)
- Social/Behavioral Sciences\* (3)

#### Second Semester

- History\* (3)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Junior Year

### **First Semester**

- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- UD MATH (3)
- UD Elective (3)
- UD elective (3)
- COMP 4001 Intro to Python Programming Credit Hours: (3)

#### Second Semester

- Humanities/Fine Arts\* (3)
- UD elective (3)
- Elective (3)
- UD MATH (3)
- UD MATH (3)

### Semester Totals 30 hrs

### Senior Year

#### **First Semester**

- UD MATH (3)
- UD MATH (3)
- UD MATH (3)
- UD MATH (3)
- Elective (3)

#### Second Semester

- Elective (3)
- Elective (3)

- UD elective (3)
- UD elective (3)
- Elective (1)

Semester Totals 28 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

# Mathematical Sciences - Data Science Concentration, (B.S.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

# The Major with Data Science Concentration (55 hrs)

### Major Core (33 hours)

#### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### **Natural Science:**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)

- CHEM 1121 General Chemistry II Lab Credit Hours: (1) OR
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

#### Completion of:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)

### Data Science Concentration (22 hours)

• COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4)

18 semester hours of upper division courses as follows:

- MATH 4635 Intro Probability Theory Credit Hours: (3)
- MATH 4636 Intro Statistical Theory Credit Hours: (3)
- COMP 4151 Intro to Data Science Credit Hours: (3)
- COMP 4745 Intro to Machine Learning Credit Hours: (3)
- MATH 4685 Statistical Learning | Credit Hours: (3)
- MATH 4686 Statistical Learning II Credit Hours: (3)

Electives must be chosen to bring the total to 120 hours.

# Typical 4-Year Data Science Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Social/Behavioral Sciences\*
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- Elective
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- Natural Science+ (4)
- Elective

#### Year Total: 31 hours

#### Sophomore Year

- History\*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- Natural Science<sup>+</sup> (4)
- Social/Behavioral Sciences\*
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts\*

• MATH 2120 - Differential Equations\*\* Credit Hours: (3) *Year Total: 33 hours* 

#### **Junior Year**

- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- COMP 4151 Intro to Data Science Credit Hours: (3)
- History\*
- MATH 4635 Intro Probability Theory Credit Hours: (3)
- MATH 4636 Intro Statistical Theory Credit Hours: (3)
- Humanities/Fine Arts\*
- UD elective
- UD elective
- UD elective
- UD elective

Year Total: 30 hours

Senior Year

- MATH 4685 Statistical Learning | Credit Hours: (3)
- MATH 4686 Statistical Learning II Credit Hours: (3)
- COMP 4745 Intro to Machine Learning Credit Hours: (3)
- UD elective
- UD elective
- UD elective
- Elective
- Elective (2)

Year Total: 26 hours

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

# Mathematical Sciences - Second Major (B.S.)

The Second Major in Mathematics is designed primarily for students whose first major is Chemistry, Computer Science, Physics, or in the Engineering College. However, students with other mathematically intensive majors may be permitted to complete a second major, provided that suitable courses for Section D can be identified.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

# Second Major in Mathematical Sciences (30 hours):

The requirements in Section A through Section D must be met:

# Section A (11 hours)

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)

# Section B (4 hours)

#### One of

- COMP 2700 Discrete Structures Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)

# Section C (9 hours)

9 additional hours from upper division MATH courses with at least one course chosen from

- MATH 4083 Dynamical Systems/Chaos Credit Hours: (3)
- MATH 4084 Introduction to Graph Theory Credit Hours: (3) 1
- MATH 4085 Introduction to Combinatorics Credit Hours: (3) 1
- MATH 4086 Analytic Number Theory Credit Hours: (3)<sup>2</sup>
- MATH 4120 Ordinary Differential Equations Credit Hours: (3)<sup>3</sup>
- MATH 4242 Linear Algebra Credit Hours: (3)
- MATH 4261 Abstract Algebra Credit Hours: (3) <sup>4</sup>
- MATH 4350 Intro Real Analysis I Credit Hours: (3) 5
- MATH 4361 Complex Variables Credit Hours: (3) <sup>6</sup>
- MATH 4391 Partial Differential Eqns I Credit Hours: (3)<sup>3</sup>
- MATH 4411 Topology Credit Hours: (3)<sup>4</sup>
- MATH 4635 Intro Probability Theory Credit Hours: (3)
- MATH 4721 Numerical Analysis Credit Hours: (3) <sup>3</sup>

### NOTE:

MATH 2120 may substitute for 3 of these hours, however, in this case, at least one course must still come from the above list.

The following courses may not be applied toward the Second Major: MATH 3581, 4050, 4051, 4080, 4081, 4082, 4151, or 4611.

- <sup>1</sup> Additional prerequisite: Either MATH 2702 or COMP 2700.
- <sup>2</sup> Additional prerequisite: MATH 3221
- <sup>3</sup> Additional prerequisite: MATH 2120.
- <sup>4</sup> Additional prerequisite: MATH 2702.
- <sup>5</sup> Additional prerequisite: both MATH 2110 and MATH 2702
- <sup>6</sup> Additional prerequisite: MATH 2110

### Section D (6 hours)

6 additional upper division hours from courses which may be chosen from either MATH and/or the student's major and must be approved by the Chair or Chair's designee of the Department of Mathematical Sciences. A list of pre-approved courses can be found here.

Electives must be chosen to bring the total number of hours to 120.

# Total Hours: 120

# Mathematical Sciences - Statistics Concentration, (B.S.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

### The Major with Statistics Concentration (56 hours)

#### Major Core (32 hours)

#### Mathematics:

- MATH 1910 Calculus | \*\* Credit Hours: (4) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)

- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) OR
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

#### **Completion of:**

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- COMP 4001 Intro to Python Programming Credit Hours: (3)

### Statistics Concentration (21 hours):

#### 21 hours of upper division Math, as follows:

- MATH 4635 Intro Probability Theory Credit Hours: (3)
- MATH 4636 Intro Statistical Theory Credit Hours: (3)
- MATH 4637 Stat Analysis/App Big Data Credit Hours: (3)

#### And either

- MATH 4607 Intro SAS Programming Credit Hours: (3) or
- MATH 4608 R for Data Proc and Visual Credit Hours: (3)

### 9 Additional upper division hours chosen from Math:

- MATH 4020 Actuarial Mathematics Credit Hours: (3)
- MATH 4242 Linear Algebra Credit Hours: (3)
- MATH 4261 Abstract Algebra Credit Hours: (3)
- MATH 4350 Intro Real Analysis | Credit Hours: (3)
- MATH 4351 Intro Real Analysis II Credit Hours: (3)
- MATH 4361 Complex Variables Credit Hours: (3)
- MATH 4391 Partial Differential Eqns | Credit Hours: (3)
- MATH 4607 Intro SAS Programming Credit Hours: (3)
- MATH 4608 R for Data Proc and Visual Credit Hours: (3)
- MATH 4640 Intro Probability Models Credit Hours: (3)
- MATH 4643 Intro Regression/Time Ser Anyl Credit Hours: (3)
- MATH 4685 Statistical Learning | Credit Hours: (3)
- MATH 4686 Statistical Learning II Credit Hours: (3)
- MATH 4721 Numerical Analysis Credit Hours: (3)

#### Electives must be chosen to bring the total to 120 hrs.

### Typical 4-Year Statistics Concentration Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Social/Behavioral Sciences\* (3)
- Elective (3)

- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- Natural Science\*\* (4)
- Elective (3)

### Semester Totals 30 hrs

### Sophomore Year

- History\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- Natural Science\*\* (4)
- Social/Behavioral Sciences\* (3)
- History\* (3)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Junior Year

- MATH 3242 Intro Linear Algebra Credit Hours: (3)
- UD MATH (3)
- COMP 4001 Intro to Python Programming Credit Hours: (3)
- UD Elective (3)
- Elective (3)
- MATH 4635 Intro Probability Theory Credit Hours: (3)
- MATH 4636 Intro Statistical Theory Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- UD elective (3)
- UD elective (3)

### Semester Totals 30 hrs

### Senior Year

- MATH 4637 Stat Analysis/App Big Data Credit Hours: (3)
- UD MATH\*\*\* (3)
- Elective (3)
- UD elective (3)
- Elective (3)
- MATH 4607 Intro SAS Programming Credit Hours: (3)
- MATH 4608 R for Data Proc and Visual Credit Hours: (3)
- UD Math\*\* (3)
- Elective (3)

• Elective (1)

Semester Totals 28 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

\*\*\*Choose from MATH 4242, MATH 4261, MATH 4350, MATH 4351, MATH 4361, MATH 4391, MATH 4607, MATH 4637, MATH 4643, MATH 4721

# Mechanical Engineering, (B.S.M.E.)

# Graduation

To earn a Bachelor of Science in Mechanical Engineering degree, the student must satisfy University and College requirements, and obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, and natural science courses used to satisfy degree requirements.

# Honors Program

The Honors in Mechanical Engineering Program provides an exceptional educational opportunity for highly motivated students to develop their talents, interests, and abilities within a curriculum designed to encourage independence and creativity.

Admission to the Honors Program: Incoming freshmen who score a minimum of 26 on the ACT, or its equivalent, are invited to participate. Transfer students or students previously enrolled at the University of Memphis are eligible for the program if they have an overall grade point average of 3.00, and a grade point average of 3.25 for course work within the Herff College of Engineering. The departmental honors committee admits eligible students to the program upon approval of the Application for Admission to the Mechanical Engineering Honors Program. Students with academic records that fall short of these requirements may apply for provisional acceptance.

<u>Retention in the Honors Program</u>: Participants must maintain a minimum overall grade point average of 3.00 and a minimum grade point average of 3.25 for course work within the college to continue in the program. The departmental honors committee may grant participants failing to meet this requirement a one semester probationary period before they are dismissed from the program.

Requirements:

• To qualify for the designation "With Honors in Mechanical Engineering", a student must successfully complete a minimum of 18 semester hours from the following: MECH 4395, MECH 4396, and 12 hours of mechanical engineering honors courses.

• To qualify for the designations "With Honors in Mechanical Engineering" and "University Honors with Thesis", a student must successfully complete a minimum of 25 semester hours from the following: MECH 4395 and MECH 4396, 9 hours of mechanical engineering honors courses, one hours fo UNHP 1100, and 9 hours of general education honors courses. To enroll in mechanical engineering honors sections, a student must request departmental approval. A minimum grade of "B" (3.0) is required in each honors course for it to count toward fulfilling the honors course requirement. Regular credit for the course will be earned if the grade is lower than a "B". A participant must select a major advisor by the beginning of the second semester junior year and enroll in MECH 4395 - Honors Thesis Proposal. Successful completion of this course requires acceptance of a thesis proposal by the departmental honors committee. During the second semester of the senior year, a participant must enroll in MECH 4396 - Honors Thesis. Successful completion of this course requires acceptance of a thesis proposal by the departmental honors the second semester of the senior year, a participant must enroll in MECH 4396 - Honors Thesis. Successful completion of this course requires acceptance of a thesis proposal by the departmental honors committee.

**Designation of "With Honors in Mechanical Engineering"**: Students who successfully complete the prescribed course work will have earned the designation of "With Honors in Mechanical Engineering." This designation will be recognized at the commencement ceremony and it will appear on the transcript and diploma.

245

# University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

### Communication

• ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

### Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling MATH 1910).

### Social/Behavioral Sciences

• ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

### **Natural Science**

- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

### History

Waived for B.S.M.E. students who have completed one unit of American history in high school.

# College and Degree Requirements (28 hours)

### Mathematics (11 hours)

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

### Natural Science (8 hours)

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)

### One of the Following:

• CHEM 1120 - General Chemistry II Credit Hours: (3) and

- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- BIOL 1110 General Biology | Credit Hours: (3) and
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1050 The Earth Through Time Credit Hours: (4)

### Collateral Courses (9 hours)

- CIVL 2131 Statics Credit Hours: (3)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3)

### One of the Following:

- EECE 2201 Circuit Analysis I Credit Hours: (3) or
- EECE 2283 Electrical Engr/Instrumntation Credit Hours: (3)

# The Major (64 hours)

### Completion of

- MECH 1310 Intro/Mechanical Engineering Credit Hours: (2)
- MECH 1312 Mech Engr Computing | Credit Hours: (2)
- MECH 1314 Mech Engr Computing II Credit Hours: (2)
- MECH 2318 Engr Design Communication Credit Hours: (3)
- MECH 2320 Mechanics of Materials Credit Hours: (3)
- MECH 2332 Dynamics Credit Hours: (3)
- MECH 2311 Engineering Thermodynamics | Credit Hours: (3)
- MECH 3312 Engineering Thermodynamics II Credit Hours: (3)
- MECH 3320 Engineering Materials Credit Hours: (3)
- MECH 3321 Mechanics of Machines Credit Hours: (3)
- MECH 3323 Machine Design Credit Hours: (3)
- MECH 3325 Materials Laboratory Credit Hours: (1)
- MECH 3331 Fluid Mechanics Credit Hours: (3)
- MECH 3335 Fluid Mechanics Lab Credit Hours: (1)
- MECH 3341 Numerical/Statistical Methods Credit Hours: (3)
- MECH 3351 Heat Transfer | Credit Hours: (3)
- MECH 4355 Thermo/Heat Transfer Lab Credit Hours: (1)
- MECH 4300 Prep/Professional Practice Credit Hours: (1)
- MECH 4314 Senior Design | Credit Hours: (3)
- MECH 4319 Engineering Econ/Project Mgmt Credit Hours: (2)
- MECH 4322 System Dynamics Credit Hours: (3)
- MECH 4323 Senior Design II Credit Hours: (3)
- MECH 4335 System Dynamics Lab Credit Hours: (1)

### Electives (9 hours)

Nine (9) hours of electives approved by the student's academic advisor.

# Typical 4-Year Mechanical Engineering Sequence

#### Fall Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ENGR 1010 Engineering Problem Solving Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MECH 1310 Intro/Mechanical Engineering Credit Hours: (2)
   Total Hours: 16

#### **Spring Semester**

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MECH 1312 Mech Engr Computing | Credit Hours: (2)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MECH 1314 Mech Engr Computing II Credit Hours: (2)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) Total Hours: 15

Semester Totals 31 hrs

### Sophomore Year

#### **Fall Semester**

- MATH 2110 Calculus III\*\* Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- CIVL 2131 Statics Credit Hours: (3)
- MECH 2318 Engr Design Communication Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Total Hours: 17

#### **Spring Semester**

- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- MECH 2311 Engineering Thermodynamics | Credit Hours: (3)
- MECH 2320 Mechanics of Materials Credit Hours: (3)
- MECH 2332 Dynamics Credit Hours: (3)
- EECE 2201 Circuit Analysis | Credit Hours: (3) Total Hours: 15

Semester Totals 32 hrs

### Junior Year

#### Fall Semester

- Social Science Credit Hours: (3)
- MECH 3312 Engineering Thermodynamics II Credit Hours: (3)
- MECH 3320 Engineering Materials Credit Hours: (3)
- MECH 3321 Mechanics of Machines Credit Hours: (3)
- MECH 3325 Materials Laboratory Credit Hours: (1)
- MECH 3331 Fluid Mechanics Credit Hours: (3) Total Hours: 16

#### Spring Semester

- ENGL 3603 Engineering Communications Credit Hours: (3)
- MECH 3323 Machine Design Credit Hours: (3)
- MECH 3335 Fluid Mechanics Lab Credit Hours: (1)
- MECH 3341 Numerical/Statistical Methods Credit Hours: (3)
- MECH 3351 Heat Transfer | Credit Hours: (3)
- Natural Science Elective Credit Hours: (4)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) or
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1) or
- ESCI 1020 Landforms \*\* Credit Hours: (4) or
- ESCI 1040 Physical Geology Credit Hours: (4) or
- ESCI 1050 The Earth Through Time Credit Hours: (4) Total Hours: 17

### Semester Totals 33 hrs

### Senior Year

#### Fall Semester

- MECH 4319 Engineering Econ/Project Mgmt Credit Hours: (2)
- MECH 4314 Senior Design | Credit Hours: (3)
- MECH 4300 Prep/Professional Practice Credit Hours: (1)
- MECH 4322 System Dynamics Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3)\*
- MECH Elective Credit Hours: (3)
- MECH 4355 Thermo/Heat Transfer Lab Credit Hours: (1) Total Hours: 16

#### **Spring Semester**

- MECH 4335 System Dynamics Lab Credit Hours: (1)
- MECH 4323 Senior Design II Credit Hours: (3)
- Technical Elective **Credit Hours:** (3)\*\*
- MECH Elective Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3)\*
- ECON 2010 Intro to Macroeconomics\*\* Credit Hours: (3) Total Hours: 16

### Semester Totals 32 hrs

# Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

\*\* An upper division course in engineering, mathematics, physics, or chemistry. Advisor's approval required.

### Accelerated B.S./M.S. Program

249 This program allows outstanding undergraduates to begin the coursework for the Master of Science in an engineering program during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average and must submit two reference letters and a copy of their transcript to their respective engineering department. Each applicant will complete an interview with the graduate academic coordinator in their respective engineering department.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

Only in ABM programs, up to 9 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Music - Composition Concentration. (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

### Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (43 hours)

**Core Requirements** 

### Completion of (16 hours):

- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)

### Theory Elective (One from the Following):

- MUTC 3101 Orchestration Credit Hours: (3)
- MUTC 3102 Analysis of Tonal Music Credit Hours: (3)
- MUTC 3109 Advanced Analysis of Post-Tonal Music Credit Hours: (3)

- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 4205 16th Cent Counterpoint Credit Hours: (2)
- MUTC 4206 18th Cent Counterpoint Credit Hours: (2)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)

### Music History

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)

History Elective (One from the Following) (3 hours):

- MUHL 4008 The Symphony Credit Hours: (3)
- MUHL 4009 Choral Literature | Credit Hours: (3)
- MUHL 4010 Choral Literature II Credit Hours: (3)
- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4406 Music since 1900 Credit Hours: (3)
- MUHL 4407 History of Opera Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

### Basic Conducting (2 hours):

• MUSE 3700 - Basic Conducting Credit Hours: (2)

### Piano

- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)

### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

### **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

### Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

# Composition:

Individual instruction in applied music to include two semesters of piano (8)

- MUTC 2501 Composition Credit Hours: (1-3)
- MUTC 2502 Composition Credit Hours: (1-3) minimum two semesters
- MUTC 4501 Composition Credit Hours: (3) (minimum three semesters)
- MUTC 4511 Electronic Music II Credit Hours: (2)
- MUTC 4512 Electronic Music III Credit Hours: (2)
- MUTC 4209 Advanced Orchestration Credit Hours: (3)
- MUTC 4599 Senior Composition Recital Credit Hours: (4)
- MUTC 4106 Composition Procsses 20th Cent Credit Hours: (3)

### Choose One of the Following Courses:

- MUTC 4205 16th Cent Counterpoint Credit Hours: (2)
- MUTC 4206 18th Cent Counterpoint Credit Hours: (2)

# Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

# Typical 4-Year Composition Concentration Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUTC 2501 Composition Credit Hours: (1-3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)

### Semester Totals 26 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science (4) \*

- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUAP 2502 (3)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUTC 2502 Composition Credit Hours: (1-3)
- Natural Science (4) \*
- MATH (3) \*
- MUAP (large ensemble) (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)
- MUAP (applied music) (2)

#### Semester Totals 36 hrs

### Junior Year

- History (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUTC 4209 Advanced Orchestration Credit Hours: (3)
- MUAP (large ensemble) (1)
- MUTC 4501 Composition Credit Hours: (3)
- MUSE 3700 Basic Conducting Credit Hours: (2)
- History (3) \*
- MUTC 420x (2)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- MUTC 4511 Electronic Music II Credit Hours: (2)
- MUAP (large ensemble) (1)
- MUTC 4501 Composition (3)

### Semester Totals 32 hrs

### Senior Year

- Social/Behavioral Sciences (3) \*
- MUTC 4501 Composition Credit Hours: (3)
- MUTC 4512 Electronic Music III Credit Hours: (2)
- Theory elective (3)
- MUAP (large ensemble) (1)
- MUTC 4599 Senior Composition Recital Credit Hours: (4)
- MUHL elective (3) \*\*
- MUAP (large ensemble) (1)
- MUTC 4106 Composition Procsses 20th Cent Credit Hours: (3)
- Social/Behavioral Sciences (3) \*

Semester Totals 26 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## Music - Jazz and Studio Composition/Arranging Concentration, (B.M.)

## University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 4806.

## Admission to the Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

```
The Major (85 hours)
```

Major Core (42 hours)

Completion of (19 hours)

- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 2103 Theory Jazz/Pop/Commercial | Credit Hours: (3)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)

#### **Music History**

- MUHL 3303 Western Music History Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)

History Elective (One From the Following) (3 Hours):

- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Basic Conducting (2 hours)

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)

## Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (43 hours)

## Jazz and Studio Composition/Arranging

• MUAP 1312 - Commerical Music Piano Credit Hours: (2)

Pianists take:

- MUAP 1550 Guitar Intro Instr Credit Hours: (1) OR
- MUSE 1119 Guitar/Music Teacher Credit Hours: (1)
- MUTC 2501 Composition Credit Hours: (1-3)
- MUTC 2504 Comp/Arrange Jazz/Commrcial II Credit Hours: (2)
- MUTC 2511 Electronic Music I Credit Hours: (2)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 3501 Comp/Arrang/Jazz/Comrcial III Credit Hours: (2)
- MUTC 3825 Material/Techniques Improv I Credit Hours: (3)
- MUTC 4106 Composition Procsses 20th Cent Credit Hours: (3)
- MUTC 4503 Comp/Arrange Jazz/Commrcial IV Credit Hours: (3)
- MUTC 4896 Sr Prj Jazz Studio/Comp Arrang Credit Hours: (4)
- MUAP 1xx2 (5)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Jazz Composition and Arranging Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP (applied music) (2)
- MUTC 1001 Basic Music Theory Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUTC 2501 Composition Credit Hours: (1-3)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)

#### Semester Totals 29 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (3)
- MUTC 3825 Material/Techniques Improv I Credit Hours: (3)
- MUTC 2103 Theory Jazz/Pop/Commercial I Credit Hours: (3)
- MUAP 3012 Univ Instrumentl Jazz Ensemble Credit Hours: (1) or
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- MATH (3) \*
- Music elective (3)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1) or
- MUAP 3013 Univ Voice Jazz Ensemble

#### Semester Totals 32 hrs

#### Junior Year

- Natural Science (4) \*
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUAP 1312 Commerical Music Piano Credit Hours: (2)
- MUTC 2511 Electronic Music | Credit Hours: (2)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

- MUTC 2504 Comp/Arrange Jazz/Commrcial II Credit Hours: (2)
- MUAP 3012 Univ Instrumentl Jazz Ensemble Credit Hours: (1)
   or
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- Natural Sciences (4) \*
- History (3) \*
- MUHL 3303 Western Music History Credit Hours: (3)
- MUAP 1312 Commerical Music Piano (2)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1) or
- MUAP 3013 Univ Voice Jazz Ensemble (1)
- MUTC 3501 Comp/Arrang/Jazz/Comrcial III Credit Hours: (2)

#### Semester Totals 31 hrs

#### Senior Year

- History (3) \*
- MUTC 4503 Comp/Arrange Jazz/Commrcial IV Credit Hours: (3)
- Music Elective (3)
- MUAP 3012 Univ Instrumentl Jazz Ensemble Credit Hours: (1)
   or
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- MUHL Elective (3)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- Music Elective (3)
- MUAP 4896 (4)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUTC 4106 Composition Procsses 20th Cent Credit Hours: (3)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1) or
- MUAP 3013 Univ Voice Jazz Ensemble (1)

#### Semester Totals 28 hrs

#### Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Music - Jazz and Studio Performance Concentration, (B.M.)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 4806.

## Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (42 hours)

**Core Requirements** 

#### Completion of (19 hours):

- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 2103 Theory Jazz/Pop/Commercial | Credit Hours: (3)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)

#### **Music History**

- MUHL 3303 Western Music History Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)

History Elective (One from the Following) (3 hours):

- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Basic Conducting (2 hours):

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)

#### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

#### **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

258

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (43 hours)

## Jazz and Studio Performance

NOTE: Jazz vocal students take MUHL 4016 instead of MUTC 3827.

- MUAP 1XX1 (1), 1XX2 (10)
- MUAP 3103 Commercial Music Combo Credit Hours: (1) Credits / Units: 5
- 4xx2 (4)
- MUAP 4895 Sr Proj Jazz/Studio Perform Credit Hours: (3)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 3825 Material/Techniques Improv | Credit Hours: (3)
- MUTC 3826 Material/Techniques Improv II Credit Hours: (3)
- MUTC 3827 Material/Techniques Improv III Credit Hours: (3)

#### Jazz Vocal Students Take

• MUHL 4016 - Jazz Vocal Styles Credit Hours: (3) instead of MUTC 3827.

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Jazz and Studio Performance Concentration Sequence

#### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP 3012 Univ InstrumentI Jazz Ensemble Credit Hours: (1)
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*

- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1) or
- MUAP 3013 Univ Voice Jazz Ensemble (1)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)

Semester Totals 30 hrs

#### Sophomore Year

- History (3) \*
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (2)
- MUTC 3825 Material/Techniques Improv I Credit Hours: (3)
- MUTC 2103 Theory Jazz/Pop/Commercial | Credit Hours: (3)
- MUAP 3012 Univ InstrumentI Jazz Ensemble Credit Hours: (1)
   or
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- MATH (3) \*
- History (3) \*
- MUAP 3103 Commercial Music Combo (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUAP (applied music) (2)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1)

or

• MUAP 3013 - Univ Voice Jazz Ensemble (1)

#### Semester Totals 34 hrs

#### Junior Year

- Natural Science (4) \*
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- MUTC 3826 Material/Techniques Improv II Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUAP (applied music) (2)
- MUAP 3012 Univ Instrumentl Jazz Ensemble Credit Hours: (1)
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- Natural Sciences (4) \*

- MUAP 3103 Commercial Music Combo (1)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUAP (2nd instrument) (1)
- MUAP 3012 Univ Instrumentl Jazz Ensemble (1) or
- MUAP 3103 Commercial Music Combo (1)
- Elective (2)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

#### Semester Totals 31 hrs

#### Senior Year

- MUID 3827 (3)
- Music Elective (3)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- MUAP 3012 Univ Instrumentl Jazz Ensemble Credit Hours: (1) or
- MUAP 3013 Univ Voice Jazz Ensemble Credit Hours: (1)
- MUAP 4xx2 (2)
- MUHL Elective (3)
- Elective (3)
- MUAP 4895 Sr Proj Jazz/Studio Perform Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUAP 4xx2 (2)

or

- MUAP 3012 Univ Instrumentl Jazz Ensemble (1)
- MUAP 3013 Univ Voice Jazz Ensemble (1)

#### Semester Totals 25 hrs

#### Total Hours: 120

#### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Music - Music Education (Choral) Concentration, (B.M.)

## University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

#### Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (89 hours)

Major Core (36 hours)

## **Core Requirements**

#### Completion of (16 hours):

- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3) or MUTC 3101 Orchestration
- MUTC 3009 Ear Training IV Credit Hours: (1)

#### **Music History**

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)

#### Basic Conducting (2 hours):

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)

#### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

#### **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

#### Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

262

## Music Education (53 hours):

Core (32 hours):

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- MUSE 4901 Residency | Credit Hours: (5)
- MUSE 4999 Professional Seminar Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- MUSE 2002 Foundations Music Ed Credit Hours: (2-3) Credits / Units: 2
- MUAP 3999 Junior Recital Credit Hours: (1)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- MUSE 4911 Residency II Credit Hours: (9) Credits / Units: 9
- MUSE 4213 Mat/Method/Elementary Music Credit Hours: (3)

## Choral Emphasis (21 hours):

- MUAP 1610 Voice Intro Instr Credit Hours: (1) (Not required of students enrolled in applied voice)
- MUAP 2108 Class Piano IV Credit Hours: (1)
- MUSE 4211 Vocal Diction | Credit Hours: (2)
- MUSE 4701 Choral Conducting Credit Hours: (2-3)

#### **Applied Music:**

at least 2 hours at the upper division level (12)

• MUSE 4405 - Matrl/Method Choral Mus 7-12 Credit Hours: (3)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music Education (Choral) Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3) \*
- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MUSE 2002 Foundations Music Ed Credit Hours: (2-3)
- MUTC 1009 Music Theory II Credit Hours: (3)

- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

#### Semester Totals 31 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- Natural Science (4) \*
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUSE 3700 Basic Conducting Credit Hours: (2)

#### Semester Totals 34 hrs

#### Junior Year

- MUSE 4213 Mat/Method/Elementary Music Credit Hours: (3)
- History (3) \*
- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUSE 4701 Choral Conducting Credit Hours: (2-3)
- MUAP (applied music) (2)
- MUAP (small ensemble) (1)
- MUAP (large ensemble) (1)
- MUSE 4211 Vocal Diction | Credit Hours: (2)
- Social/Behavioral Sciences (3) \*
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- MUSE 4405 Matrl/Method Choral Mus 7-12 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- MUAP (applied music) (2)
- MUAP (ensemble) (1)
- MUSE 4523 Vocal Pedagogy Credit Hours: (2)
- MUAP 3999 Junior Recital Credit Hours: (1)

Semester Totals 34 hrs

Senior Year

- MUSE 4901 Residency | Credit Hours: (5)
- History (3) \*
- Natural Science (4) \*
- MUAP (large ensemble) (1)
- MUSE 4999 Professional Seminar Credit Hours: (3)
- MUSE 4911 Residency II Credit Hours: (9)

Semester Totals 25 hrs

## Total Hours: 124

## Total Hours Required for Graduation: 124

\*Must satisfy University General Education Program Requirement

## Music - Music Education (Instrumental) Concentration, (B.M.)

## University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

#### Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (90 hours)

Major Core (36 hours)

**Core Requirements** 

#### Completion of (16 hours):

- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3) or MUTC 3101 Orchestration
- MUTC 3009 Ear Training IV Credit Hours: (1)

#### **Music History**

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)

## Basic Conducting (2 hours):

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)

#### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

#### **Concert Attendance:**

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Music Education: (54 hours)

## Core (32 hours):

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- MUSE 4901 Residency | Credit Hours: (5)
- MUSE 4999 Professional Seminar Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- MUSE 2002 Foundations Music Ed Credit Hours: (2-3)
- MUAP 3999 Junior Recital Credit Hours: (1)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- MUSE 4911 Residency II Credit Hours: (9)
- MUSE 4213 Mat/Method/Elementary Music Credit Hours: (3)

#### Instrumental Emphasis (22 hours):

- MUSE 1101 Class Inst Brass Credit Hours: (1)
- MUSE 1103 Class Inst Percussion Credit Hours: (1)
- MUSE 1104 Class Inst Woodwinds Credit Hours: (1)
- MUSE 1116 Class Instr Strings Credit Hours: (1)
- MUSE 4205 Marching Band Technique Credit Hours: (1)
- MUSE 4403 Material/Meth Inst Musc 9-12 Credit Hours: (3) Credits / Units: 3
- MUSE 4700 Instrumental Conducting Credit Hours: (2-3)

**Applied Music:** 

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music Education (Instrumental) Concentration Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3) \*
- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- MUSE 1104 Class Inst Woodwinds Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MUSE 2002 Foundations Music Ed Credit Hours: (2-3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- MUSE 1103 Class Inst Percussion Credit Hours: (1)

#### Semester Totals 33 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUSE 1116 Class Instr Strings Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUSE 1101 Class Inst Brass Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (ensemble) (1)
- Natural Science (4) \*

#### Junior Year

- MUSE 4213 Mat/Method/Elementary Music Credit Hours: (3)
- History (3) \*
- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUSE 4700 Instrumental Conducting Credit Hours: (2-3)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUSE 4205 Marching Band Technique Credit Hours: (1)
- MUAP (ensemble) (1)
- Social/Behavioral Sciences (3) \*
- MUSE 4403 Material/Meth Inst Musc 9-12 Credit Hours: (3)
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUAP 3999 Junior Recital Credit Hours: (1)

#### Semester Totals 32 hrs

#### Senior Year

- MUSE 4901 Residency | Credit Hours: (5)
- History (3) \*
- Natural Science (4) \*
- MUAP (large ensemble) (1)
- MUSE 4999 Professional Seminar Credit Hours: (3)
- MUSE 4911 Residency II Credit Hours: (9)

Semester Totals 25 hrs

Total Hours: 125

## Total Hours Required for Graduation: 125

\*Must satisfy University General Education Program Requirement

## **Music - Music History Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

## **Rudi E. Scheidt School of Music**

268 Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (43 hours)

#### Completion of (16 hours)

- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)

## Theory Elective (One From the Following):

- MUTC 3101 Orchestration Credit Hours: (3)
- MUTC 3102 Analysis of Tonal Music Credit Hours: (3)
- MUTC 3109 Advanced Analysis of Post-Tonal Music Credit Hours: (3)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 3301 Commercial Music Arranging Credit Hours: (3)
- MUTC 4205 16th Cent Counterpoint Credit Hours: (2)
- MUTC 4206 18th Cent Counterpoint Credit Hours: (2)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)

#### **Music History**

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)

#### History Elective (One From the Following) (3 hours)

- MUHL 4008 The Symphony Credit Hours: (3)
- MUHL 4009 Choral Literature | Credit Hours: (3)
- MUHL 4010 Choral Literature II Credit Hours: (3)
- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4406 Music since 1900 Credit Hours: (3)
- MUHL 4407 History of Opera Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Basic Conducting (2 hours)

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)

## Intro to Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

## Ensemble Requirement:

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (42 hours)

## Music History:

- Individual instruction in applied music (10)
- MUHL 4259 Studies in Bibliography Credit Hours: (3)
- Electives (11)
- Advanced Music History (9)
- Foreign Language: 6 semester hours in addition to requirements for admission (6)
- MUHL 4999 Music History Senior Project Credit Hours: (3)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music History Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (small ensemble) (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (ensemble) (1)

#### Semester Totals 29 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
  - or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History (3) \*
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP (large ensemble) (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- Foreign Language (3)
- MATH (3) \*
- MUAP 2108 Class Piano IV Credit Hours: (1)
- History (3) \*
- MUAP (ensemble) (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUAP (applied music) (2)
- Foreign Language (3)

#### Semester Totals 34 hrs

#### Junior Year

- Natural Science (4) \*
- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUAP (applied music) (2)
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUAP (ensemble) (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Sciences (4) \*
- Concentration elective (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- Concentration elective (2)
- MUAP (ensemble) (1)
- MUHL elective (3) \*\*\*

#### Semester Totals 31 hrs

#### Senior Year

- Concentration Elective (2)
- MUHL elective (3)

- MUHL elective (3)
- MUHL 4259 Studies in Bibliography Credit Hours: (3)
- MUAP (ensemble) (1)
- MUHL 4999 Music History Senior Project Credit Hours: (3)
- MUHL elective (3) \*\*\*
- MUAP (ensemble) (1)
- Concentration elective (2)
- Concentration elective (2)
- MUTC elective (3)

Semester Totals 26 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Choose one from MUTC 3101, MUTC 3102, MUTC 3109, MUTC 3201, MUTC 3301, MUTC 4205, MUTC 4206, MUTC 4210

\*\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## Music - Performance Concentration, (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302 for Music Performance Majors.

## **Rudi E. Scheidt School of Music**

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

```
The Major (85 hours)
```

Major Core (43 hours)

Completion of (16 hours)

- MUTC 1008 Music Theory I Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)

## Theory Elective (One From the Following)

- MUTC 3101 Orchestration Credit Hours: (3)
- MUTC 3102 Analysis of Tonal Music Credit Hours: (3)
- MUTC 3109 Advanced Analysis of Post-Tonal Music Credit Hours: (3)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 4205 16th Cent Counterpoint Credit Hours: (2)
- MUTC 4206 18th Cent Counterpoint Credit Hours: (2)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3) Note: Brass Performance majors can take MUTC 3825 MAT/TECH IMPROV I.

#### **Music History**

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)

#### History Elective (One From the Following) (3 hours)

- MUHL 4008 The Symphony Credit Hours: (3)
- MUHL 4009 Choral Literature | Credit Hours: (3)
- MUHL 4010 Choral Literature II Credit Hours: (3)
- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4406 Music since 1900 Credit Hours: (3)
- MUHL 4407 History of Opera Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Basic Conducting (2 hours)

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

#### Piano

- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)

With one Exceptions:

Piano Performance majors take MUSE 3101, MUAP 1320, MUAP 1330. All undergraduate Music majors, irrespective of concentration must take a piano placement examination before enrolling in the School of Music. This evaluation will place students in the appropriate course in the class-piano sequence. All piano proficiency requirements as appropriate to the concentration must be passed before graduation.

Students already proficient in piano may be permitted to bypass the class-piano sequence and enroll in MUSE 3101, which will satisfy this requirement and any student may choose to take the departmental Piano Proficiency Examination in lieu of coursework. Since the requirements for this exam vary according to the area of concentration, contact the Coordinator of Class Piano for specific details.

### **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (42 hours)

#### Performance

Instruction in performance leading to the Bachelor of Music in Music with a concentration in Performance is provided for the following areas: Trumpet, Horn, Trombone, Tuba, and Euphonium (Brass Instruments); Piano, Harpsichord, and Organ (Keyboard Instruments); Percussion; Violin, Viola, Violoncello, Bass, Guitar, and Harp (String Instruments), Flute, Oboe, Clarinet, Saxophone, and Bassoon (Woodwind Instruments); Voice.

Individual Instruction in Major Performance Area (24 hours)

Instruction in Secondary Performance Area, Repertory, and/or Pedagogy (7 hours):

#### For Brass Instruments:

- MUHL 4020 Solo Brass Literature Credit Hours: (3)
- MUSE 4514 Brass Pedagogy Credit Hours: (3)
- MUAP 4004 Orchestral Excerpts Credit Hours: (1)

For Woodwind Instruments:

- MUSE 4521 Woodwind Pedagogy Credit Hours: (3)
- MUAP 4004 Orchestral Excerpts Credit Hours: (1)
- MUAP 4263 Reed Making Credit Hours: (1)

Flute and Saxophone Players Should Take

• MUAP 3701 - Woodwind Ensemble Credit Hours: (1) instead of reed making

#### **Clarinet Players Take**

- MUAP 3701 Woodwind Ensemble Credit Hours: (1) or an additional
- MUAP 4004 Orchestral Excerpts Credit Hours: (1) instead of Reed Making

#### For Percussion:

- MUHL 4030 Percussion Repertory Credit Hours: (3)
- MUSE 4520 Percussion Pedagogy Credit Hours: (3)

#### For Bowed Strings:

6 hours chosen from

- MUHL 4500 String Repertory Credit Hours: (3)
- MUAP 4004 Orchestral Excerpts Credit Hours: (1)
- MUHL 4008 The Symphony Credit Hours: (3)
- MUHL 4022 Early Chamber Music Credit Hours: (3)
- MUHL 4011 String Quartet Literature Credit Hours: (3)
- MUSE 4506 Suzuki String Pedagogy | Credit Hours: (3)
- and/or up to 2 hours of an approved secondary string instrument

#### For Guitar:

- MUHL 4015 Guitar Literature Credit Hours: (3)
- MUSE 4251 Guitar Pedagogy Credit Hours: (3)

#### For Voice:

- MUSE 4523 Vocal Pedagogy Credit Hours: (2)
- MUHL 4002 Song Repertory | Credit Hours: (2)
- MUHL 4003 Song Repertory II Credit Hours: (2)

#### For Piano:

- MUHL 4001 Piano Repertory Credit Hours: (2)
- MUSE 4501 Piano Pedagogy | Credit Hours: (2)
- MUSE 4505 Collab Piano Technique Credit Hours: (2)

Junior Recital (1 hour)

Artist Recital (4 hours)

• MUAP 4999 - Artist Recital Credit Hours: (4)

#### Small Ensembles (2-6 hours)

Four semesters of small ensembles, chosen from those listed under "Small Ensembles and Chamber Music" in consultation with the major advisor, is required. Piano performance students must take a minimum of four (4) semesters of MUAP 3301, Chamber Music for Keyboard, as part of the music core requirements for ensembles.

For students in voice, MUSE 4211 - Vocal Diction I, MUSE 4212 - Vocal Diction II, and a demonstrated proficiency equivalent to the first semester university level courses in French, German, and Italian.

For Piano performance students, the following is to be taken in lieu of the four hours of class piano: Functional Keyboard Skills (1).

- MUSE 3101 Functional Keyboard Skills Credit Hours: (2)
- MUAP 1330 Organ Intro Instruction Credit Hours: (1)
- MUAP 1320 Harpsichord Intro Instr Credit Hours: (1)

#### **Music Electives**

As needed to satisfy 120 hour degree requirement.

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Performance Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP (applied music) (3)
- MUAP (large ensemble) (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP (applied music) (3)
- MUAP (large ensemble) (1)

#### Semester Totals 31 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- MUAP (applied music) (3)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP (ensemble) (1)
- MUAP (small ensemble) (1)
- History (3) \*
- Small ensemble (1)
- MATH (3) \*
- History (3) \*
- MUTC 3008 Post-Tonal Music Credit Hours: (3)
- MUTC 3009 Ear Training IV Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)
- MUAP (applied music) (3)
- MUAP (ensemble) (1)

Semester Totals 32 hrs

Junior Year

- Natural Science (4) \*
- Small ensemble (1)
- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUAP (ensemble) (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUAP (applied music) (4)
- Natural Science (4) \*
- MUTC (3) \*\*
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- MUAP (applied music) (4)
- MUAP (ensemble) (1)
- MUAP 3999 Junior Recital Credit Hours: (1)

#### Semester Totals 32 hrs

#### Senior Year

- MUHL Elective (3)
- Music Elective (3)
- MUAP (ensemble) (1)
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUAP (applied music) (4)
- MUAP 4999 Artist Recital Credit Hours: (4)
- Music Elective (3)
- Music Elective (3)
- UD elective (3)
- MUAP (ensemble) (1)
- MUAP (small ensemble) (1)

Semester Totals 25 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Choose one from MUTC 3101, MUTC 3102, MUTC 3109, MUTC 3201, MUTC 3301, MUTC 4205, MUTC 4206, MUTC 4210

\*\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## **Music Industry - Music Business Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 48xx. Note the following B.M. degree with a major in Music Industry program specifications: (1) Music Business must complete ECON 2010 and ECON 2020 to fulfill the Social/Behavioral Sciences requirement; (2) for the mathematics requirement, Music Business must complete MATH 1530 and Recording Technology must complete MATH 1830; (3) PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 (Natural Science requirement) is recommended for the Recording Technology concentration. The Humanities category is satisfied for students who meet all B.M. requirements.

## Admission Information for the Rudi E. Scheidt School of Music

The Music Industry degree is a Bachelors of Music degree; therefore, it requires an audition before any student can be admitted to any Rudi E. Scheidt School of Music program. Audition information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (85 hours)

#### Major Core (29 hours)

- MUTC 1002 Musicianship I Credit Hours: (5)
- MUTC 2002 Musicianship II Credit Hours: (5)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUAP xxxx (ensembles) (2)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)
- 1xxx (applied instruction) (4)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)

#### Choose One:

- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4804 Blues Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Concert/Recital Attendance

Students must attend 50 concerts/recitals prior to graduation.

## Music Business Concentration (56 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- FIR 1220 Personal Financial Management Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3) Or
- PBRL 4431 Music Promo/Public Relations Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- MUID 2201 Intro to Music Industry Credit Hours: (2)
- MUID 3105 Music Marketing & Management Credit Hours: (3)
- MUID 3506 Music Distribution Credit Hours: (3)
- MUID 4301 Legal Aspcts Live Ent Industry Credit Hours: (3)
- MUID 4604 Legal Aspects Music Industry Credit Hours: (3)
- MUID 4825 Concerts and Touring Credit Hours: (3)
- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUID 4850 Record Company Operations | Credit Hours: (3)
- MUID 4851 Record Company Operations II Credit Hours: (4)
- MUID 4898 Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)
- MUID 4899 Internship Credit Hours: (1-3)

## Electives (0 - 3 hours)

Elective courses may be chosen to bring the total number of hours to 120.

## Typical 4-Year Music Business Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- Natural Science (4) \*
- MUTC 1008 Music Theory | Credit Hours: (3)
- Applied music (1)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano I Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- Natural Science (4) \*
- MUAP 1116 Jazz Class Piano Credit Hours: (1)
- MUID 2201 Intro to Music Industry Credit Hours: (2)
- MUAP (applied music) (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)

#### Semester Totals 32 hrs

#### Sophomore Year

- MUTC 2008 Chromatic Harmony Credit Hours: (3) or MUTC 4210 Music Theory: Popular Styles
- History (3) \*
- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MUAP (applied music) (1)
- MUAP Ensemble (1)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- History (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- MUAP (applied music) (1)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Ensemble (1)

#### Semester Totals 29 hrs

#### Junior Year

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MUID 3506 Music Distribution Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUID 4301 Legal Aspcts Live Ent Industry Credit Hours: (3)
- MUID 4604 Legal Aspects Music Industry Credit Hours: (3)

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MUID 3105 Music Marketing & Management Credit Hours: (3)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)
- MUID 4825 Concerts and Touring Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)

Semester Totals 30 hrs

#### Senior Year

- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUID 4850 Record Company Operations | Credit Hours: (3)
- FIR 1220 Personal Financial Management Credit Hours: (3)
- MUID 4899 Internship Credit Hours: (1-3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- MUID 4851 Record Company Operations II Credit Hours: (4)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MUID 4898 Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)
- MUHL (3) \*\*

Semester Totals 29 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Choose one: MUHL 4801, MUHL 4804, MUHL 4805, MUHL 4806, MUHL 4807

## **Music Industry - Recording Technology Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 48xx. Note the following B.M. degree with a major in Music Industry program specifications: (1) Music Business must complete ECON 2010 and ECON 2020 to fulfill the Social/Behavioral Sciences requirement; (2) for the mathematics requirement, Music Business must complete MATH 1530 and Recording Technology must complete MATH 1830; (3) PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 (Natural Science requirement) is recommended for the Recording Technology concentration. The Humanities category is satisfied for students who meet all B.M. requirements.

#### Admission Information for the Rudi E. Scheidt School of Music

The Music Industry degree is a Bachelors of Music degree; therefore, it requires an audition before any student can be admitted to any Rudi E. Scheidt School of Music program. Audition information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (85 hours)

## Major Core (29 hours)

- MUTC 1002 Musicianship I Credit Hours: (5)
- MUTC 2002 Musicianship II Credit Hours: (5)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUAP xxxx (ensembles) (2)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)
- 1xxx (applied instruction) (4)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)

#### Choose One:

- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4804 Blues Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Concert/Recital Attendance

Students must attend 50 concerts/recitals prior to graduation.

## Recording Technology Concentration (56 hours)

- MUID 2201 Intro to Music Industry Credit Hours: (2)
- MUID 3800 Recording Studio Technology Credit Hours: (3)
- MUID 3801 Digital Data Structures Credit Hours: (2)
- MUID 3901 Critical Listening | Credit Hours: (1)
- MUID 3902 Critical Listening II Credit Hours: (1)
- MUID 3903 Critical Listening III Credit Hours: (1)
- MUID 3905 Digital Audio Workstations Credit Hours: (3)
- MUID 4604 Legal Aspects Music Industry Credit Hours: (3)
- MUID 4800 Basic Recording Credit Hours: (4)
- MUID 4802 Advanced Recording Credit Hours: (3)
- MUID 4803 Adv Mix/Master Audio Credit Hours: (3)
- MUID 4811 Studio Maintenance Practicum Credit Hours: (1-3)
- MUID 4822 Applied Lessons in Recording Credit Hours: (1)
- MUID 4830 Trends Business Pract/Tech Credit Hours: (3)
- MUID 4833 Applied Lessons in Mixing Credit Hours: (1)
- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUID 4850 Record Company Operations | Credit Hours: (3)
- MUID 4898 Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)
- MUID 4899 Internship Credit Hours: (1-3)
- TECH 1811 Electronic Circuit Technology Credit Hours: (3)
- TECH 2821 Solid State Technology Credit Hours: (3)

#### Recording Technology Elective Path (6 hours)

Students are to complete the elective hours in one academic area. Electives are to be chosen from an approved list of classes, which is available from the student's advisor.

## Electives (0 - 3 hours)

## Typical 4-Year Recording Technology Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MUTC 1008 Music Theory I Credit Hours: (3)
- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP (applied music) (1)
- MUTC 1010 Ear Training | Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MUID 2201 Intro to Music Industry Credit Hours: (2)
- Social/Behavioral Sciences (3) \*
- MUAP 1116 Jazz Class Piano Credit Hours: (1)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP (applied music) (1)
- TECH 1811 Electronic Circuit Technology Credit Hours: (3)

#### Semester Totals 32 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- MUTC 2008 Chromatic Harmony Credit Hours: (3) or MUTC 4210 Music Theory: Popular Styles
- MUTC 2010 Ear Training III Credit Hours: (1)
- TECH 2821 Solid State Technology Credit Hours: (3)
- MUAP (applied music) (1)
- MUID 3901 Critical Listening | Credit Hours: (1)
- MUID 3800 Recording Studio Technology Credit Hours: (3)
- Music ensemble (1)
- MUID 3801 Digital Data Structures Credit Hours: (2)
- MUID 3902 Critical Listening II Credit Hours: (1)
- MUID 3905 Digital Audio Workstations Credit Hours: (3)
- MUID 4800 Basic Recording Credit Hours: (4)
- Music Ensemble (1)
- MUAP (applied music) (1)

#### Semester Totals 28 hrs

#### Junior Year

- Natural Science (4) \*
- Elective (3)
- MUID 3903 Critical Listening III Credit Hours: (1)
- MUID 4604 Legal Aspects Music Industry Credit Hours: (3)
- MUID 4802 Advanced Recording Credit Hours: (3)
- MUID 4811 Studio Maintenance Practicum Credit Hours: (1-3)
- MUID 4822 Applied Lessons in Recording Credit Hours: (1)

- Elective (3)
- Natural Science (4)
- MUID 4833 Applied Lessons in Mixing Credit Hours: (1)
- MUID 4803 Adv Mix/Master Audio Credit Hours: (3)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)
- MUID 4899 Internship Credit Hours: (1-3)

Semester Totals 31 hrs

#### Senior Year

- History (3) \*
- MUHL (3) \*\*
- MUID 4830 Trends Business Pract/Tech Credit Hours: (3)
- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUID 4850 Record Company Operations I Credit Hours: (3)
- History (3)\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUID 4898 Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)

Semester Totals 29 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Choose one: MUHL 4801, MUHL 4804, MUHL 4805, MUHL 4806, MUHL 4807

## **Music-Commercial Music Performance Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and any 4000 level elective.

## **Rudi E. Scheidt School of Music**

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (79 hours)

Major Core (38 hours)

- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUTC 2008 Chromatic Harmony Credit Hours: (3) or
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)

## **Music History**

- MUHL 3303 Western Music History Credit Hours: (3)
- Any MUHL 4000 level course

## History Elective (One From the Following) (3 hours)

- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

## Basic Conducting (2 hours)

• MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

- MUAP 1105 Class Piano | Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)

#### Intro Music Technology

• MUID 1001 - Intro Music Technology Credit Hours: (1)

#### **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (47 hours)

#### **Commercial Music Performance**

- MUAP 1XX1 (1)
- MUAP 1XX2 (10)
- MUAP 4XX2 (4)
- MUAP 3103 Commercial Music Combo Credit Hours: (1) (6)
- MUAP 4895 Sr Proj Jazz/Studio Perform Credit Hours: (3)
- MUID 2201 Intro to Music Industry Credit Hours: (2)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUID 3905 Digital Audio Workstations Credit Hours: (3)
- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUTC 3301 Commercial Music Arranging Credit Hours: (3)
- MUTC 3825 Material/Techniques Improv I Credit Hours: (3)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Commercial Music Performance Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1010 Ear Training | Credit Hours: (1)
- MUAP 1105 Class Piano I Credit Hours: (1)
- MUID 1001 Intro Music Technology Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MUTC 1009 Music Theory II Credit Hours: (3)
- MUTC 1011 Ear Training II Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 1116 Jazz Class Piano Credit Hours: (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo (1)

#### Semester Totals 30 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- MUTC 2008 Chromatic Harmony Credit Hours: (3)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)
- MUTC 2010 Ear Training III Credit Hours: (1)

- MUTC 2103 Theory Jazz/Pop/Commercial I Credit Hours: (3)
- MUAP (ensemble) (1)
- MUID 2201 Intro to Music Industry Credit Hours: (2)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- MATH (3) \*
- History (3) \*
- MUTC 3301 Commercial Music Arranging Credit Hours: (3)
- MUID 3103 Contmp Songwrt/Prod Technique Credit Hours: (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo (1)

#### Semester Totals 32 hrs

#### Junior Year

- Natural Science (4) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- MUSE 3700 Basic Conducting Credit Hours: (2)
- MUTC 3825 Material/Techniques Improv I Credit Hours: (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- Natural Science (4) \*
- History (3) \*
- MUHL 3303 Western Music History Credit Hours: (3)
- MUID 3905 Digital Audio Workstations Credit Hours: (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (1)
- MUAP 3103 Commercial Music Combo (1)

#### Semester Totals 32 hrs

#### Senior Year

- Music Elective (3)
- MUHL Elective (3)
- MUID 4840 Entrepreneurship Comm Music Credit Hours: (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo Credit Hours: (1)
- Elective (3)
- MUAP 4895 Sr Proj Jazz/Studio Perform Credit Hours: (3)
- MUHL Elective (3)
- MUAP (ensemble) (1)
- MUAP (applied music) (2)
- MUAP 3103 Commercial Music Combo (1)

#### Semester Totals 26 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Nursing, (B.S.N.)

## University General Education Program (41 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

#### Natural Science:

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3) \*
- BIOL 2011 Anat/Physiology | Lab \*\* Credit Hours: (1) \*
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3) \*
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1) \*

#### Social/Behavioral Sciences:

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

#### Support Courses for Nursing Major (10 hours)

All support courses must be completed with a minimum cumulative grade of "C".

#### Microbiology (4 hours):

Science courses must have a minimum cumulative grade point average of 2.66 and must have been completed in the past 7 years. Refer to Science Course Validation section below.

- BIOL 1230 Microbiology \*\* Credit Hours: (3)
- BIOL 1231 Microbiology Lab \*\* Credit Hours: (1)

#### Nutrition (3 hours):

- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- NUTR 3202 Nutrition/Health Care Credit Hours: (3)

#### Statistics (3 hours):

If MATH 1530 is used for math general education course and support course, the student will need an elective course for the additional 3 hours.

- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)
- SOCI 3311
  - with a minimum grade of "C"

## Completion of

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3105 Foundations PT-Centered Care Credit Hours: (3)
- NURS 3106 Foundational Nursing Skills Credit Hours: (2)
- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3205 Nurs Adult I/Common HIth Alt Credit Hours: (3)
- NURS 3206 Nursing Adult I/Practicum Credit Hours: (3)
- NURS 3127 Mental Health Nursing Credit Hours: (3)
- NURS 3129 Mental Health Nurs Practicum Credit Hours: (1)
- NURS 3217 Nursing/Childbearing Family Credit Hours: (2)
- NURS 3219 Nurs Childbearing Family Pract Credit Hours: (2)
- NURS 3227 Pediatric Nursing Credit Hours: (2)
- NURS 3229 Pediatric Nursing Practicum Credit Hours: (2)
- NURS 3230 Gerontological Nursing Credit Hours: (3)
- NURS 3231 Gerontological Nurs Practicum Credit Hours: (3)
- NURS 3305 Nurs Adult II/Complex HIt Alt Credit Hours: (3)
- NURS 3306 Nurs Adult II/Complex Pract Credit Hours: (3)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)

## Elective (3 hours)

Any upper division course at the 3000 or 4000 level.

#### Nursing Course Requirements - Basic Students/Accelerated BSN Option

#### Completion of

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3105 Foundations PT-Centered Care Credit Hours: (3)
- NURS 3106 Foundational Nursing Skills Credit Hours: (2)
- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3205 Nurs Adult I/Common HIth Alt Credit Hours: (3)
- NURS 3206 Nursing Adult I/Practicum Credit Hours: (3)
- NURS 3127 Mental Health Nursing Credit Hours: (3)
- NURS 3129 Mental Health Nurs Practicum Credit Hours: (1)
- NURS 3217 Nursing/Childbearing Family Credit Hours: (2)
- NURS 3219 Nurs Childbearing Family Pract Credit Hours: (2)
- NURS 3227 Pediatric Nursing Credit Hours: (2)
- NURS 3229 Pediatric Nursing Practicum Credit Hours: (2)
- NURS 3230 Gerontological Nursing Credit Hours: (3)

- NURS 3231 Gerontological Nurs Practicum Credit Hours: (3)
- NURS 3305 Nurs Adult II/Complex HIt Alt Credit Hours: (3)
- NURS 3306 Nurs Adult II/Complex Pract Credit Hours: (3)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)

#### Upper Division Elective (3 hours):

Any 3000-4000 course.

## Nursing Course Requirements - RN Students

Nursing (31 hours):

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)

#### Upper Division Elective (3 hours):

Any 3000-4000 course.

#### Note

The remaining hours for the major requirements are fulfilled by validation.

Under the Tennessee Career Mobility Plan registered nurses who have graduated from Tennessee schools or out-of-state Nursing accredited programs will be able to progress to the baccalaureate degree in nursing without testing to verify previous nursing education. Registered nurses articulating to the baccalaureate level may be awarded or transfer in nursing credits equivalent to approximately one year of nursing courses. For this to occur, a minimum grade of "C" must have been earned in previous nursing course work. Nursing credits transferred or awarded will be held in escrow. These credits will be placed on individual transcripts only after students have successfully completed 15 hours of nursing courses with a minimum grade of "C" in The Loewenberg College of Nursing. Non nursing credits are transferred according to university policies. Testing will be required for graduates of non Nursing accredited programs or for students who have not been in active clinical practice in the past three years.

The following represent typical schedule plans for basic students.

## **Basic BSN Students**

#### **Freshman Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3)
 The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3) or
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- Humanities (3) \*
- History (3) \*
- Social/Behavioral Sciences (3) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3) or
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- History (3) \*
- MATH (3) \*
- Humanities (3) \*

#### Semester Totals 32 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- BIOL 1230 Microbiology \*\* Credit Hours: (3) or
- BIOL 1231 Microbiology Lab \*\* Credit Hours: (1)
- Social/Behavioral Sciences (3) \*
- NUTR 2202 Nutrition \*\* Credit Hours: (3) or
- NUTR 3202 Nutrition/Health Care Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3105 Foundations PT-Centered Care Credit Hours: (3)
- NURS 3106 Foundational Nursing Skills Credit Hours: (2)

#### Semester Totals 30 hrs

### Junior Year

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3127 Mental Health Nursing Credit Hours: (3)
- NURS 3129 Mental Health Nurs Practicum Credit Hours: (1)
- NURS 3205 Nurs Adult I/Common HIth Alt Credit Hours: (3)
- NURS 3206 Nursing Adult I/Practicum Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)

- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 3217 Nursing/Childbearing Family Credit Hours: (2)
- NURS 3219 Nurs Childbearing Family Pract Credit Hours: (2)
- NURS 3230 Gerontological Nursing Credit Hours: (3)
- NURS 3231 Gerontological Nurs Practicum Credit Hours: (3)
- Statistics (3)

Semester Totals 33 hrs

### Senior Year

- NURS 3305 Nurs Adult II/Complex HIt Alt Credit Hours: (3)
- NURS 3306 Nurs Adult II/Complex Pract Credit Hours: (3)
- NURS 3227 Pediatric Nursing Credit Hours: (2)
- NURS 3229 Pediatric Nursing Practicum Credit Hours: (2)
- Upper Div Elective (3)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)

#### Semester Totals 25 hrs

#### Note

\*Must satisfy University General Education Program Requirements

<sup>1</sup> Take one of the following: EDPR 4541, SOCI 3311, or any approved statistics course. If statistics was taken as your general education math, either MATH 1530, you may take an elective course.

# Progression Of Nursing Coursework:

All courses in group A must be completed before enrolling in any courses in group B. All courses in group B must be completed before enrolling in any courses in group C. All courses in group C must be completed before enrolling in any course in Group D. All courses in group D must be completed before enrolling in any course in Group E.

# Group A:

- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3105 Foundations PT-Centered Care Credit Hours: (3)
- NURS 3106 Foundational Nursing Skills Credit Hours: (2)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)

# Group B:

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3127 Mental Health Nursing Credit Hours: (3)
- NURS 3129 Mental Health Nurs Practicum Credit Hours: (1)
- NURS 3205 Nurs Adult I/Common HIth Alt Credit Hours: (3)
- NURS 3206 Nursing Adult I/Practicum Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)

• NURS 4129 - Community HIth Nurs Practicum \*\* Credit Hours: (1)

### Group C:

- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 3230 Gerontological Nursing Credit Hours: (3)
- NURS 3231 Gerontological Nurs Practicum Credit Hours: (3)
- NURS 3217 Nursing/Childbearing Family Credit Hours: (2)
- NURS 3219 Nurs Childbearing Family Pract Credit Hours: (2)

#### Group D:

- NURS 3227 Pediatric Nursing Credit Hours: (2) \*
- NURS 3229 Pediatric Nursing Practicum Credit Hours: (2) \*
- NURS 3305 Nurs Adult II/Complex Hlt Alt Credit Hours: (3)
- NURS 3306 Nurs Adult II/Complex Pract Credit Hours: (3)

#### Group E:

- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4) \*
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8) \*

#### Note

\*Accelerated students only may take approved courses concurrently.

The following represent a sample full-time schedule for RN students:

# RN (Upper Division Requirements)

#### Senior Year

\*Statistics prior to nursing courses.

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4110 Evidence Based Practice Nurs \*\* Credit Hours: (3)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)
- UD elective (3)

#### Semester Totals 34 hrs

#### Note

\* Take one of the following: EDPR 4541, PSYC 3001, or SOCI 3311, or any approved statistics course.

# Science Course Validation:

If seven years have lapsed since credit was earned in BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 (Anatomy and Physiology), or BIOL 1230/BIOL 1231 (Microbiology), the content is considered outdated, and students are required to either repeat the course(s) or validate currency of knowledge. Required validation of current science knowledge for RNs will occur through employer verification, repeating of course, taking a higher level science course in the same field, or obtaining a fiftieth (50th) percentile score or above on the NLN appropriate science test.

# Philosophy, (B.A.)

Program objectives for a B.A. in Philosophy are to: (a) recognize patterns of valid and fallacious reasoning, and basics of logical theory; (b) read a major philosophical text analytically and be able to compose critical evaluations of philosophical arguments; (c) be familiar with major ethical theories and their practical applications; (d) possess a basic knowledge of the history of philosophy, in particular of Ancient Philosophy and Modern Philosophy; (e) be able to engage critically both the primary and secondary literature on philosophical subject matter, to present one's critical assessment orally to a group, and to produce a written document reflecting one's independent research on a philosophical subject.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (30 hours)

Completion of 30 semester hours in philosophy courses including

- PHIL 1101 Intro to Philosophy Credit Hours: (3)
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- PHIL 3001 History of Ancient Philosophy \*\* Credit Hours: (3)
- PHIL 3002 History of Modern Philosophy \*\* Credit Hours: (3)
- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3) or
- PHIL 3511 Ethical Theory Credit Hours: (3) and
- 15 additional upper division semester hours

To prepare philosophy students for success in a number of fields, the department offers courses in the following sub-divisions of philosophy

Philosophy of Law/Political Philosophy

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- PHIL 3516 Philosophy of Law \*\* Credit Hours: (3)

- PHIL 3550 Issues in Political Philosophy Credit Hours: (3)
- PHIL 3751 Philosophy of Race & Racism Credit Hours: (3)
- PHIL 4551 Social and Political Philosophy Credit Hours: (3)

#### Ethics/Social Philosophy

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3452 Feminist Theory Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- PHIL 3550 Issues in Political Philosophy Credit Hours: (3)
- PHIL 3571 Business Ethics and Society \*\* Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)
- PHIL 3751 Philosophy of Race & Racism Credit Hours: (3)
- PHIL 3806 Data Ethics Credit Hours: (3)
- PHIL 4551 Social and Political Philosophy Credit Hours: (3)

#### Philosophy of Religion/Religious Studies

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3451 Existentialism Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3701 Human and the Divine Credit Hours: (3)
- PHIL 3702 Philosophy of Religion Credit Hours: (3)
- PHIL 3721 Chinese Philosophy Credit Hours: (3)

#### Philosophy/Contemporary Culture

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3451 Existentialism Credit Hours: (3)
- PHIL 3452 Feminist Theory Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)
- PHIL 3771 Philosophy in Literature Credit Hours: (3)
- PHIL 3781 Philosophy and Film Credit Hours: (3)
- PHIL 4441 Recent Continental Philosophy Credit Hours: (3)
- PHIL 4671 Aesthetics Credit Hours: (3)

#### Philosophy of Science/Epistemology

- PHIL 3460 Nature/Mind/Knowledge Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- PHIL 3621 Intermediate Logic Credit Hours: (3)
- PHIL 4421 Philosophy of Mind Credit Hours: (3)
- PHIL 4422 Recent Anglo American Phil Credit Hours: (3)
- PHIL 4632 Advanced Logic Credit Hours: (3)
- PHIL 4661 Philosophy of Science Credit Hours: (3)

### Electives

# Honors Program

This program is open to philosophy majors with an inclusive grade point average of at least 3.0 and a grade point average of at least 3.5 in the major. The student will complete, with a minimum grade of "B", a thesis submitted for credit in PHIL 4891. The thesis topic must be approved by the thesis director before the student registers for PHIL 4891.

Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Philosophy." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Philosophy Sequence

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3-4)
- PHIL 1101 Intro to Philosophy Credit Hours: (3) or
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- Social/Behavioral Sciences (3)\*
- Elective (3)

#### Semester Totals 30-31 hrs

# Sophomore Year

or

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History\*/Foreign Lang (3)
- Elective (3)
- PHIL 3001 History of Ancient Philosophy \*\* Credit Hours: (3)
- Natural Science\* (4)
- Social/Behavioral Sciences\* (3)
- History\* /Foreign Lang (3)
- UD PHIL (3)
- PHIL 3002 History of Modern Philosophy \*\* Credit Hours: (3)
- Natural Science\* (4)

#### Semester Totals 32 hrs

### Junior Year

- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
  - or
- PHIL 3511 Ethical Theory Credit Hours: (3)
- History\*/Elective (3)
- UD PHIL (3)
- Fine Arts (3)\*
- History\*/Elective (3)
- UD PHIL (3)
- UD Elective (3)
- UD PHIL (3)

### Semester Totals 30 hrs

### Senior Year

- Elective (3)
- UD PHIL (3)
- UD Elective (3)
- Elective (3)
- Elective (4)

Semester Totals 28 hrs

Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Physical Education Teacher Education - School Concentration, (B.S.Ed.)**

# **Physical Education Teacher Education - School Concentration, (B.S.Ed.)**

Program objectives for a B.S.Ed. in Physical Education Teacher Education are: (a) to identify critical elements of motor skill performance, and combine motor skills into appropriate sequences for the purpose of improving learning; (b) to demonstrate competent motor skill performance in a variety of physical activities; (c) to describe performance concepts and strategies related to skillful movement and physical activity (e.g., fitness principles, game tactics, skill improvement principles); (d) to describe and apply bioscience (anatomical, physiological, and biomechanical) and psychological concepts to skillful movement, physical activity, and fitness; (e) to understand and debate current physical education/activity issues and laws based on historical, philosophical, and sociological perspectives; (f) to demonstrate knowledge of approved state and national content standards and local program goals in schools and community settings.

\*Note: The School Concentration is a Licensure track concentration. In order for the School concentration to result in Residency and teacher licensure, student must be admitted to the Teacher Education Program (TEP).

# University General Education Program (41 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# The Major (39 hours)

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- ESMS 3853 Motor Behavior Credit Hours: (3)
- PETE 2000 Introduction to PETE Credit Hours: (3)
- PETE 2001 Individual Fitness Teaching Credit Hours: (3)
- PETE 2002 Ed Games/Team Sport Skill Credit Hours: (3)
- PETE 2003 Skill Competence in Individual Sports Credit Hours: (3)
- PETE 2010 Educational Dance and Gymnastics Credit Hours: (3)
- PETE 3307 Psychosocial Aspect of Sport\*\* Credit Hours: (3)
- PETE 3308 Exceptional Learner Phys Ed Credit Hours: (3)
- PETE 3800 Instr Strategies Phys Ed Credit Hours: (3)

### School Physical Education Concentration (40 hours)

- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- PETE 4201 Curr/Integ Learn/EI PE Well Credit Hours: (3)
- PETE 4301 Curr/Integ Learn/Sec PE/Well Credit Hours: (3)
- PETE 4401 Learner Assessment PE/Well Credit Hours: (3)
- PETE 4501 Residency | Practicum PE/Well Credit Hours: (5)
- PETE 4601 Residency II Seminar PE/Well Credit Hours: (3)
- PETE 4701 Residency II Practicum PE/Well Credit Hours: (9)
- PHED 1722 Swim-Lifeguarding Credit Hours: (2) OR
- PHED 1713 Intermediate Swim Credit Hours: (2) OR
- PHED 2703 Teaching Swimming and WSI Credit Hours: (3) Choose 1 Coaching Elective:
- PETE 3400 Coaching Team/Individual Sports Credit Hours: (3) OR
- PETE 3450 Motivation in Athletics and Coaching Credit Hours: (3) OR
- PETE 3500 Sports Performance Training for Coaches Credit Hours: (3) OR
- PETE 3550 Sports Officiating Techniques Credit Hours: (3) OR
- PETE 3600 Sport Coaching Administration and Leadership Credit Hours: (3)

# Typical 4-Year Physical Education Teacher Education (School Concentration) Sequence

# **Freshman Year**

### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Natural Science (4) \*
- Mathematics (3) \*
- Social/Behavioral Sciences (3) \*

• Humanities/Fine Arts (3) \*

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Humanities (3) \*

Year Totals : 32 Hours

### Sophomore Year

### **First Semester**

- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- PETE 2000 Introduction to PETE Credit Hours: (3)
- PETE 2001 Individual Fitness Teaching Credit Hours: (3)
- PETE 2003 Skill Competence in Individual Sports Credit Hours: (3)
- History (3)\*

#### Second Semester

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- PETE 2002 Ed Games/Team Sport Skill Credit Hours: (3)
- PETE 2010 Educational Dance and Gymnastics Credit Hours: (3)

Year Totals : 30 Hours

Junior Year

#### **First Semester**

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)
- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- PETE 3307 Psychosocial Aspect of Sport\*\* Credit Hours: (3)
- PHED 1713 Intermediate Swim Credit Hours: (2) \*\*

#### Second Semester

- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- ESMS 3853 Motor Behavior Credit Hours: (3)
- PETE 3308 Exceptional Learner Phys Ed Credit Hours: (3)
- PETE 3800 Instr Strategies Phys Ed Credit Hours: (3)
- Coaching Elective\*\*\*

# Senior Year

### **First Semester**

- PETE 4201 Curr/Integ Learn/EI PE Well Credit Hours: (3)
- PETE 4301 Curr/Integ Learn/Sec PE/Well Credit Hours: (3)
- PETE 4401 Learner Assessment PE/Well Credit Hours: (3)
- PETE 4501 Residency | Practicum PE/Well Credit Hours: (5)

### Second Semester

- PETE 4601 Residency II Seminar PE/Well Credit Hours: (3)
- PETE 4701 Residency II Practicum PE/Well Credit Hours: (9)

Year Totals : 26 Hours

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Swimming credit can be substituted with advanced courses in swimming. CPR Certification required for Student Teaching. Course not required but advised.

# **Physical Education Teacher Education - Sport Coaching Concentration** (**B.S.Ed.**)

# **Physical Education Teacher Education - Sport Coaching Concentration, (B.S.Ed.)**

Program objectives for a B.S.Ed. in Physical Education Teacher Education are: (a) to identify critical elements of motor skill performance, and combine motor skills into appropriate sequences for the purpose of improving learning; (b) to demonstrate competent motor skill performance in a variety of physical activities; (c) to describe performance concepts and strategies related to skillful movement and physical activity (e.g., fitness principles, game tactics, skill improvement principles); (d) to describe and apply bioscience (anatomical, physiological, and biomechanical) and psychological concepts to skillful movement, physical activity, and fitness; (e) to understand and debate current physical education/activity issues and laws based on historical, philosophical, and sociological perspectives; (f) to demonstrate knowledge of approved state and national content standards and local program goals in schools and coaching settings.

\*Note: the Sport Coaching concentration does NOT result in licensure.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# The Major (33 hours)

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- ESMS 3853 Motor Behavior Credit Hours: (3)
- PETE 2000 Introduction to PETE Credit Hours: (3)
- PETE 3307 Psychosocial Aspect of Sport\*\* Credit Hours: (3)
- PETE 3308 Exceptional Learner Phys Ed Credit Hours: (3)
- PETE 3800 Instr Strategies Phys Ed Credit Hours: (3) Choose 2 of the following four courses:
- PETE 2001 Individual Fitness Teaching Credit Hours: (3)
- PETE 2002 Ed Games/Team Sport Skill Credit Hours: (3)
- PETE 2003 Skill Competence in Individual Sports Credit Hours: (3)
- PETE 2010 Educational Dance and Gymnastics Credit Hours: (3)

### Sport Coaching Concentration (24 hours)

- ESMS 3502 Prevention/Care of Athletic Injuries Credit Hours: (3)
- PETE 3400 Coaching Team/Individual Sports Credit Hours: (3)
- PETE 3450 Motivation in Athletics and Coaching Credit Hours: (3)
- PETE 3500 Sports Performance Training for Coaches Credit Hours: (3)
- PETE 3550 Sports Officiating Techniques Credit Hours: (3)
- PETE 3600 Sport Coaching Administration and Leadership Credit Hours: (3)
- PETE 4605 Internship Credit Hours: (3-9)

# Electives (22 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

# Typical 4-Year Physical Education Teacher Education (Sport Coaching) Sequence

# Freshman Year

#### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Natural Science (4)\*
- Mathematics (3)\*
- Social/Behavioral Sciences (3)\*
- Humanities (3)\*

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- Natural Science (4)\*
- History (3)\*
- Humanities (3)\*

Year Totals : 32 hours

Sophomore Year

# **First Semester**

- PETE 2000 Introduction to PETE Credit Hours: (3)
- History (3)\*
- PETE Concentration (3)\*\*
- Coaching Concentration (3)\*\*\*
- Elective (3)

### Second Semester

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) OR
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- PETE Concentration (3)\*\*
- Coaching Concentration (3)\*\*\*

Year Totals : 30 Hours

### Junior Year

#### **First Semester**

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ESMS 3502 Prevention/Care of Athletic Injuries Credit Hours: (3)
- PETE 3307 Psychosocial Aspect of Sport\*\* Credit Hours: (3)
- Coaching Concentration (3)\*\*\*
- Elective (3)

### Second Semester

- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- ESMS 3853 Motor Behavior Credit Hours: (3)
- PETE 3308 Exceptional Learner Phys Ed Credit Hours: (3)
- PETE 3800 Instr Strategies Phys Ed Credit Hours: (3)
- Coaching Concentration (3)\*\*\*

Year Totals : 30 Hours

### Senior Year

### **First Semester**

- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)
- Coaching Concentration (3)\*\*\*
- Elective (7)

### Second Semester

- PETE 4605 Internship Credit Hours: (3-9) (6 credit hours required by program)
- Elective (9)

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*PETE Concentration - Select 2 of the following four courses: PETE 2001, PETE 2002, PETE 2003, PETE 2010

\*\*\*Coaching Concentration: PETE 3400, PETE 3450, PETE 3500, PETE 3550, PETE 3600

# **Physics - Astronomy Concentration (B.S.)**

The objectives of the BS in Physics program with a concentration in Astronomy are to (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develocomputational skills both in programming and data analysis, (f) be able to use specialized research equipment, (g) be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) apply knowledge to independent research projects.

The Astronomy concentration is designed for students interested in acquiring knowledge and pursue a graduate degree in the field of astronomy and astrophysics. The concentration provides rigorous theoretical and computational training covering subject topics such as stars, galaxies, exoplanets, black holes, cosmology, and astrobiology.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

# Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

# **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

# The Major (69 hours in addition to University General Education Program)

#### Major Core (47 hours)

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### **Completion of:**

• MATH 1920 - Calculus II\*\* Credit Hours: (4)

- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)

• PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)

- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics I Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- PHYS 3011 Methods of Theoretical Physics- I Credit Hours: (3)
- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)

# Astronomy Concentration (22 hours)

- PHYS 3050 Introductory Astronomy and Astrophysics Credit Hours: (3)
- PHYS 3051 Intermediate Astronomy Lab Credit Hours: (1)
- PHYS 3052 Life in the Universe Credit Hours: (3)
- PHYS 3053 Observational Astronomy Credit Hours: (3)
- PHYS 4055 Stellar and Galactic Astronomy Credit Hours: (3)
- PHYS 4056 Extragalactic Astronomy Credit Hours: (3)
- PHYS 4300 Advanced Topics in Astronomy Credit Hours: (3) Plus one upper division elective in Physics

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4991; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Physics Astronomy Concentration 4 year Plan

# Freshman Year

### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) Semester Total 15 hrs.

# Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) Semester Total 15 hrs.

# Sophomore Year

# **First Semester**

- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics I Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- GE Humanities (3)\*

Semester Total: 14 hrs

# Second Semester

- PHYS 3050 Introductory Astronomy and Astrophysics Credit Hours: (3)
- PHYS 3051 Intermediate Astronomy Lab Credit Hours: (1)
- PHYS 3990 Research in Physics II Credit Hours: (2)
- GE Social/Behavioral Science (3)
- GE History (3) \*
- GE Humanities (3)\*

Semester Total: 15 hrs

# Junior Year

### **First Semester**

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PHYS 4050 Astrophysics | Credit Hours: (3)
- GE History (3) \*
- GE Social/Behavioral Sciences (3) \*
- PHYS 4230 Electronics Credit Hours: (4) Semester Total 16 hrs

# Second Semester

- PHYS 4222 Environmental Physics Credit Hours: (3)
- Elective (3)
- Elective (3)
- Elective (3)
- UD Elective (3) Semester Total 15 hrs.

# Senior Year

# **First Semester**

- PHYS 4051 Astrophysics II Credit Hours: (3)
- UD Elective (3)
- UD Elective (3)
- Elective (3)
- Elective (3)

Semester Total: 15 hrs

# Second Semester

- PHYS 4300 Advanced Topics in Astronomy Credit Hours: (3)
- UD Elective (3)
- UD Elective (3)
- UD Elective (3)
- Elective (3)

Semester Total 15 hrs.

# Total Hours: 120

# Note:

GE = General Education Requirements BS = Bachelor of Science college requirements UD = Upper Division

Foreign Language Requirement - See the Undergraduate Catalog

Degree hours = 120 42 Upper Division hours required for graduation

No more than 2 hours of physical education courses may be counted toward a degree

Residence - 30 of the last 60 hours must be taken at University of Memphis; at least 60 hours must be at a four-year institution; transfer students must earn at least 6 hours of a major at UofM and at least 3 hours of a minor at UofM

# **Physics - General Physics Concentration, (B.S.)**

The objectives of the BS in Physics program are to (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develop computational skills both in programming and data analysis, (f) be able to use specialized research equipment, (g) be able to collaborate with other students inside and outside the laboratory and during problem-solving sessions, and (h) apply knowledge to execute independent research projects.

The program is tailored to provide fundamental knowledge in physics and skills necessary for students to succeed in physics or closelyrelated graduate programs, professional programs, or in a wide range of careers.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

# Mathematics

# **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

# The Major (71 hours in addition to University General Education Program)

#### Major Core (47 hours)

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### **Completion of:**

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)
- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics I Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- PHYS 3011 Methods of Theoretical Physics- I Credit Hours: (3)
- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)

# General Physics (24 hours):

- PHYS 3111 Mechanics | Credit Hours: (3)
- PHYS 3211 Electricity and Magnetism-I Credit Hours: (3)
- PHYS 4510 Thermal and Statistical Physics Credit Hours: (3)
- PHYS 4410 Introduction to Quantum Mechanics Credit Hours: (3)
- PHYS 4420 Introduction to Computational Physics Credit Hours: (3)
- PHYS 4211 Waves and Optics Credit Hours: (3)
- plus six (6) hours of upper division PHYS courses.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

306

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Physics Sequence General Physics Concentration

# Freshman Year

#### **First Semester**

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- ENGL 1010 English Composition\*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3) Semester Total: 15 hrs

### Semester Totals 30 hrs

# Sophomore Year

#### **First Semester**

- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics I Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

- PHYS 3011 Methods of Theoretical Physics- I Credit Hours: (3)
- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)
- Elective (1)
- Social/Behavioral Sciences (3) \* Semester Total: 15 hrs

# Semester Totals 30 hrs

#### First Semester

- PHYS 3111 Mechanics | Credit Hours: (3)
- History (3) \*
- UD Physics Elective (3)
- Humanities (3)\*
- Social/Behavioral Sci (3)\*

#### Semester Total: 15 hrs

#### Second Semester

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
  - or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PHYS 3211 Electricity and Magnetism-I Credit Hours: (3)
- History (3) \*
- Humanities (3) \*
- UD Physics Elective (3)

Semester Total: 15 hrs

# Semester Totals 30 hrs

# Senior Year

#### First Semester

- PHYS 4410 Introduction to Quantum Mechanics Credit Hours: (3)
- PHYS 4211 Waves and Optics Credit Hours: (3)
- UD elective (3)
- Elective (3)
- UD Elective (3)

Semester Total: 15 hrs

#### Second Semester

- PHYS 4420 Introduction to Computational Physics Credit Hours: (3)
- PHYS 4510 Thermal and Statistical Physics Credit Hours: (3)
- Elective (3)
- UD Elective (3)
- Elective (3)

Semester Total: 15 hrs

# Semester Totals 30 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Physics - Materials Science Concentration, (B.S.)**

The objectives of the BS program in physics with a concentration in Materials Science are to: (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develop computational skills both The online catalog can be accessed at: http://catalog.memphis.edu/index.php

308 programming and data analysis, (f) be abile to use specialized research equipment, (g) be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) apply of knowledge to independent research projects.

This concentration is deigned for students interested in pursuing an advanced degree and/or a career in materials science or closely related field. The concentration provides thorough theoretical, computational and experimental training covering subject topics such as hard and soft materials, photonic materials, semiconductors, magnetic materials, and nanomaterials. The concentration provides rigorous hands-on training with advanced research-grade instruments to synthesize advanced materials and analyze their properties.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

# Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

### **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

# The Major (71 hours in addition to University General Education Program)

#### Major Core (47 hours)

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### **Completion of:**

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)
- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics | Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- PHYS 3011 Methods of Theoretical Physics- I Credit Hours: (3)
- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)

# Materials Science (24 hours):

- PHYS 3111 Mechanics | Credit Hours: (3)
- PHYS 3211 Electricity and Magnetism-I Credit Hours: (3)
- PHYS 4410 Introduction to Quantum Mechanics Credit Hours: (3)
- PHYS 4610 Solid State Physics Credit Hours: (3)
- PHYS 4720 Materials Physics Credit Hours: (3)
- PHYS 4994 Research in Materials Physics Credit Hours: (3)
- PHYS 4510 Thermal and Statistical Physics Credit Hours: (3)

# Plus One from the following:

- PHYS 4020 Soft Matter and Biological Physics Credit Hours: (3)
- PHYS 4230 Electronics Credit Hours: (4)
- PHYS 4420 Introduction to Computational Physics Credit Hours: (3)
- PHYS 4620 Device Physics and Microfabric Credit Hours: (3)
- PHYS 4820 Materials Physics Lab Credit Hours: (3)
- MECH 3320 Engineering Materials Credit Hours: (3)
- CIVL 3322 Mechanics of Materials Credit Hours: (3)

# Electives

#### Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4991; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Physics Sequence Materials Science Concentration

# **Freshman Year**

#### First Semester

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- ENGL 1010 English Composition\*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

### Semester Totals 30 hrs

### Sophomore Year

#### First Semester

- PHYS 2990 Research in Physics I Credit Hours: (1)
- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

- GE Humanities/Fine Arts (3) \*
- GE Social/Behavioral Sci (3) \*
- UD Elective (1)
- PHYS 3011 Methods of Theoretical Physics- | Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2) Semester Total: 15 hrs

### Semester Totals 30 hrs

### Junior Year

#### First Semester

- PHYS 3111 Mechanics | Credit Hours: (3)
- PHYS 4720 Materials Physics Credit Hours: (3)
- GE History (3) \*
- Elective (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

- MATH 2120 Differential Equations\*\* Credit Hours: (3)
- PHYS 3211 Electricity and Magnetism-I Credit Hours: (3)
- PHYS 4510 Thermal and Statistical Physics Credit Hours: (3)
- GE History (3) \*
- Elective (3)

Semester Total: 15 hrs

### Semester Totals 30 hrs

### Senior Year

#### First Semester

- PHYS 4410 Introduction to Quantum Mechanics Credit Hours: (3)
- PHYS 4820 Materials Physics Lab Credit Hours: (3)
- GE Social/Behavioral Sciences (3) \*
- UD Elective (3)

• GE History (3) \* Semester Total: 15 hrs

#### Second Semester

- PHYS 4610 Solid State Physics Credit Hours: (3)
- GE Humanities/Fine Arts (3) \*
- UD Elective (3)
- UD Elective (3)
- UD Elective PHYS/MECH/CIVL (3) Semester Total: 15 hrs

Semester Totals 30 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*One of PHYS 4020, 4060, PHYS 4230, PHYS 4420, PHYS 4620, MECH 3320, CIVL 3322, MECH 3322

# **Physics - Physics for Medical Sciences Concentration, (B.S.)**

The objectives of the BS program in Physics with a concentration in Medical Sciences are: (a) to acquire knowledge of core principles in physics, (b) to be able to justify and explain specific approaches to solving problems, (c) to develop an understanding of research methodology in physics, (d) to be able to effectively communicate scientific results in both oral and written reports, (e) to develop computational skills both programming and data analysis, (f) to be able to use specialized research equipment, (g) to be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) to apply knowledge to independent research projects.

This concentration is designed for students interested in pursuing graduate studies in the medical sciences and a career in the health industry. The concentration provides theoretical, computational, and experimental training covering subject topics including medical physics, biophysics, biomaterials, nuclear physics, environmental physics, and radiation physics.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

# **Mathematics**

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

# **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

# The Major (70 hours in addition to University General Education Program)

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 2120 Differential Equations\*\* Credit Hours: (3) Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### Completion of:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)
- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics | Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- PHYS 3011 Methods of Theoretical Physics- | Credit Hours: (3)
- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)

# Physics for Medical Sciences (23 hours):

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- PHYS 4020 Soft Matter and Biological Physics Credit Hours: (3)
- PHYS 4021 Applied Radiation Physics Credit Hours: (3)
- PHYS 4040 Medical Physics Credit Hours: (3)
- PHYS 4110 Nuclear and Particle Physics Credit Hours: (3)
- PHYS 4990 Research in Physics III Credit Hours: (3)

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Physics Sequence Physics for Medical Sciences Concentration

#### **First Semester**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1) Semester Total 15 hrs.

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1) Semester Total 15 hrs.

#### Semester Totals 30 hrs

### Sophomore Year

#### **First Semester**

- PHYS 2130 Intermediate Physics Credit Hours: (4)
- PHYS 2990 Research in Physics | Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) Semester Total 15 hrs.

#### Second Semester

- PHYS 3060 Advanced Physics Methodology Credit Hours: (3)
- UD Elective (3)
- Elective (3)
- PHYS 3990 Research in Physics II Credit Hours: (2)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1) Semester Total 15 hrs.

### Semester Totals 30 hrs

# Junior Year

#### First Semester

- PHYS 4020 Soft Matter and Biological Physics Credit Hours: (3)
- PHYS 4021 Applied Radiation Physics Credit Hours: (3)
- GE History (3)
- UD Elective (3)
- UD Elective (3)
  - Semester Total 15 hrs

#### Second Semester

- PHYS 4040 Medical Physics Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- GE History (3)\*
- UD Elective (3)
- UD Elective (3)

Semester Total: 15 hrs

#### Semester Totals 31 hrs

### Senior Year

#### **First Semester**

- PHYS 4110 Nuclear and Particle Physics Credit Hours: (3)
- UD Elective (3)
- UD Elective (3)
- GE Humanities/Fine Arts (3)
- GE Social/Behavioral Science (3) Semester Total 15 hrs

#### Second Semester

- PHYS 4990 Research in Physics III Credit Hours: (3)
- GE Humanities/Fine Arts (3)
- GE Social/Behavioral Science (3)
- UD Elective (3)
- UD Elective (3)

Semester Total 15 hrs.

### Semester Totals 31 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

## Note:

GE = General Education Requirements	BS = Bachelor of Science college requirements	UD = Upper Division
OE - General Education Requirements	BB – Buchelor of Belefice conege requirements	

Foreign Language Requirement - See the Undergraduate Catalog

Degree hours = 120 42 Upper Division hours required for graduation

No more than 2 hours of physical education courses may be counted toward a degree

Residence - 30 of the last 60 hours must be taken at University of Memphis; at least 60 hours must be at a four-year institution; transfer students must earn at least 6 hours of a major at UofM and at least 3 hours of a minor at UofM

# **Physics - Second Major for the Bachelor of Science Degree, (B.S.)**

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

# Second Major for the Bachelor of Science Degree

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1720 Trigonometry\*\* Credit Hours: (3) or
- MATH 1730 Pre-Calculus\*\* Credit Hours: (4) or
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- PHYS 2010 General Physics I Credit Hours: (3) and
- PHYS 2011 General Physics Lab I Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3) and
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3) and
- PHYS 2021 General Physics Lab II Credit Hours: (1) or
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) and
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- PHYS 3010 Introduction to Modern Physics Credit Hours: (3)
- 6 hours UD in PHYS
- 6 hours UD in PHYS or student's major (As approved by Physics Chair or advisor)

# **Political Science**, (B.A.)

Program objectives for a B.A. in Political Science are: (a) basic understanding of political institutions and processes in the United States and other countries; (b) basic understanding of the ways in which countries interact with one another, directly or through intermediary institutions; (c) basic understanding of the development of political thought; (d) able to apply basic political science methodologies to political science questions; (e) able to analyze and explain political processes and outcome; (f) able to interpret political attitudes, values, and beliefs; (g) have the critical thinking skills necessary for careers in government, business, law, or academia.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (36 hours)

For the purposes of defining undergraduate requirements for the political science major and minor, the department employs four subfields, with the following courses in each:

# American Government and Politics:

- POLS 1030 American Government\*\* Credit Hours: (3)
- POLS 3211 State/Local Government Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- POLS 3215 Interest Groups/Amer Politics Credit Hours: (3)
- POLS 3216 Political Parties/Elections \*\* Credit Hours: (3)
- POLS 3217 The Political Media \*\* Credit Hours: (3)
- POLS 3218 The American Presidency Credit Hours: (3)
- POLS 3219 Judicial Process \*\* Credit Hours: (3)
- POLS 3220 U. S. Congress Credit Hours: (3)
- POLS 3221 Public Opinion Credit Hours: (3)
- POLS 3222 Politics, Race, and Cinema Credit Hours: (3)
- POLS 3405 Intro Law/Jurisprudence Credit Hours: (3)
- POLS 4200 Envrnmntl Law/Policy/Regulatn Credit Hours: (3)
- POLS 4202 Constitutional Law: Civil Rights Credit Hours: (3)
- POLS 4211 Const Law/National Powers Credit Hours: (3)
- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4223 Issues/Urban Politics Credit Hours: (3)

### **Comparative Politics:**

- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 3302 West Europe Govt/Politics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3309 Govt/Politics of Mid East \*\* Credit Hours: (3)
- POLS 3310 Politics/Developed World Credit Hours: (3)
- POLS 3311 Global Politics and Sports Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3340 Power/Politics/State Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)
- POLS 4315 Revolution/Political Violence Credit Hours: (3)
- POLS 4316 Democratic Erosion Credit Hours: (3)
- POLS 4317 Democratic Transitions Credit Hours: (3)
- POLS 4820 Political History of Israel Credit Hours: (3)

# International Relations:

- POLS 1501 International Relations\*\* Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- POLS 3506 American Foreign Policy \*\* Credit Hours: (3)
- POLS 3509 Contmp Prblm Intl Relation Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)
- POLS 4506 Prob American Foreign Policy Credit Hours: (3)
- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)

- POLS 4511 International Security Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- POLS 4513 Human Security Credit Hours: 3

### Political Theory:

- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- POLS 3401 Legal/Pol Thght Classical Credit Hours: (3)
- POLS 3402 Legal/Political Thght Modern Credit Hours: (3)
- POLS 3410 Contemporary Political Thght \*\* Credit Hours: (3)
- POLS 3411 Critical Race Theory Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 3420 Race and Politics in U.S. Credit Hours: (3)
- POLS 3430 Conservative Political Thought Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)

#### Note:

Students must complete POLS 1030 and POLS 4101.

Students must complete at least 6 hours in each of the four subfields listed above.

No more than 9 total hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and study abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 36 hours required for a major in Political Science. Of these 9 hours, no more than three hours of Administrative Internship (POLS 4231), and no more than six total hours in any combination of POLS 4709, POLS 4399, and POLS 4702 may be counted toward the major.

At least 15 hours in political science must be earned in residence at the University of Memphis.

NOTE: Students who have successfully completed an equivalent social statistics course prior to declaring a Political Science major are exempted from the requirement to take POLS 4101, and must substitute another upper-division course in Political Science.

NOTE: The College offers Pre-Law advising for those interested in careers in law. Also, any major in Political Science may earn a second major in International Studies. Political Science courses in International Relations and Comparative Politics fulfill requirements for both the Political Science major and the interdisciplinary major in International Studies.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The department offers an honors program to qualified majors who choose to pursue a more sophisticated knowledge of the discipline, a more rigorous level of analysis, and a deeper understanding of politics. Students who have completed 55 hours of course work (with at least 9 hours in Political Science), have an inclusive grade point average of at least 3.0 and a cumulative grade point average of at least 3.25 in the major, or who can present equivalent qualifications, are invited to apply for admission to the program.

The program requires 18 hours of honors course work, 12 or more of which must be upper-division Political Science courses, and minimum final grade point averages of 3.00 overall, 3.25 in Political Science, and 3.25 in honors coursework. Honors students also have the option of completing a Senior Thesis in Political Science (POLS 4999). Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Political Science." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Details of the program are available in the Political Science Office.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3-4)
- POLS 1030 American Government\*\* Credit Hours: (3)
- Elective (3)
- Foreign Language/B.A. (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3) or
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)

Semester Totals 30-31 hrs

# Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History\* (3)
- Natural Science\* (4)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- Fine Arts\* (3)
- POLS Political Theory (3)
- Natural Science\* (4)
- Elective (3)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

### Semester Totals 32 hrs

# Junior Year

- UD elective (3)
- Elective (3)
- UD POLS (3)
- UD POLS Comparative Politics (3)
- POLS 4101 Political Statistics \*\* Credit Hours: (3)
- UD POLS Amer. Gov. & Policy (3)
- UD POLS International Relations (3)
- UD POLS (3)
- UD elective (3)
- Elective (3)

# Semester Totals 30 hrs

### Senior Year

or

- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- Elective (3)
- Elective (3)
- UD elective (3)
- Elective (4)

### Semester Totals 28 hrs

# Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Professional Studies, Alcohol and Drug Abuse Services, (B.P.S.)

Students in the Alcohol and Drug Abuse Services concentration will select from a set of courses in alcohol & drug abuse and social and public service. Prior work experience is welcomed and evaluated through portfolio assessment. Internships are also included in this concentration. Persons pursuing this degree typically provide services to those disabled by alcohol and drug abuse, including abusers, families, friends, colleagues, and associates. Wishing to build upon knowledge and experience in alcohol and drug abuse treatment, persons served by these guidelines will seek careers in Alcohol & Drug Abuse (A&D) Services as providers of social and public services in hospitals, social service agencies, employee assistance programs, churches, etc. Some may wish to continue their education in graduate-level programs.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (30 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core (6 hours)

- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

### Alcohol and Drug Core (6 hours)

- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- CJUS 4152 Drug Misuse and Abuse Credit Hours: (3)
- COUN 4783 Alcohol/Drug Abuse Services Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4) (Prerequisites: PSYC 1030, PSYC 3010, PSYC 3020)

### Professional Writing (3 hours)

- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3) (Prerequisite MIS 2749)

#### Social and Public Services (15 hours)

#### Choose from the following:

- CJUS 4533 Juvenile Deling Theory/Process Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- PSYC 3102 Abnormal Psychology Credit Hours: (3)
- PSYC 3103 Child Psychology \*\* Credit Hours: (3)
- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- SOCI 3501 Sociology of Deviant Behavior \*\* Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)
- SOCI 4852 Sociology of Mental Illness Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3) (Prerequisites: SWRK 2911, SWRK 2010; BIOL 1010)

# Guided Electives and Internship (15 hours)

Guided Electives - Choose any 12 hours from courses in the Coordinated Study that have not already been taken.

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php.

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# **Electives**

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Child Development and Family Studies, (B.P.S.)**

The Bachelor of Professional Studies with a concentration in Child Development and Family Studies focuses on recognizing and enhancing important developmental milestones for children from birth through adolescence. Students will learn how to create effective learning environments to promote children's healthy development as well as assist parents in creating positive relationships and environments for the development of their children. In addition, students study the stages of development from infancy through adolescence and the ways that family, culture, peers, and schools influence the growth of children. Students will also explore the importance of advocacy for children and their families whether it be in the classroom, hospital, or justice system.

The B.P.S. with a concentration in Child Development and Family Studies courses are designed to reflect professional standards set forth by the National Association for the Education of Young Children (NAEYC). These standards are critical indicators of program quality.

In addition to core courses based on early childhood development, these guidelines contain course work designed to develop skills and knowledge of the historical, social, cultural, and educational contexts of the field.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (48 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Child Development & Family Studies Core (21 hours)

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- CDFS 4223 Home/School/Comm Engage Credit Hours: (3)
- CDFS 4910 Ethics in Early Care and Learning Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

# Family and Society (3 hours)

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- MRCH 4300 Family Resource Management\*\* Credit Hours: (3)
- PSYC 4034 Children Soc Relationships Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

# Counseling (3 hours)

- COMM 4341 Interpersonal Communication \*\* Credit Hours: (3)
- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- COUN 4783 Alcohol/Drug Abuse Services Credit Hours: (3)

# Historical Context (3 hours)

- ANTH 3282 American Communities \*\* Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4831 History American Family \*\* Credit Hours: (3)
- HIST 4851 History of Women in America \*\* Credit Hours: (3)
- HIST 4853 African American Women Credit Hours: (3)
- HIST 4863 History/Childhood in America \*\* Credit Hours: (3)

# Social Services and Public Policy (6 hours)

- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)
- SWRK 4934 Child Welfare Policy/Services Credit Hours: (3) All SWRK courses require permit from the department.

# Educational Context (9 hours)

- ART 3411 Art for Children Credit Hours: (3)
- AUSP 4006 Language & Speech Development Credit Hours: (3)
- CDFS 3420 Play-Based Assessment for Young Children (0-4) Credit Hours: (3)
- CDFS 4101 Int Curr for Early Learners Credit Hours: (3)
- ENGL 3401 Children's Literature Credit Hours: (3)
- HLSC 3306 Elementary School Health and Wellness Credit Hours: (2)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)

# Internship (3 hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

# College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

323

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (22-28 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Child Life Specialist (B.P.S.)

These guidelines for a Bachelor of Professional Studies with a concentration in Child Life Specialist are designed for persons seeking careers as child life specialists. Child life specialists are professionals who work closely with children and their families in hospitals and other settings to help them cope with the challenges of hospitalization, illness, and disability. Child life specialists provide children with age-appropriate preparation for medical procedures, pain management and coping strategies through a variety of different activities. Students must complete the application process as the field is highly selective.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

Prior to enrolling in any upper-division Child Life Specialist Concentration Courses, students must complete the following 6 hours of general education as required by the Association of Child Life Professionals (ACLP):

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

# Coordinated Study (59 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at:https://fcbeacad.memphis.edu/permits/

# Child Development & Family Studies Core (21 hours)

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- CDFS 4223 Home/School/Comm Engage Credit Hours: (3)
- CDFS 4910 Ethics in Early Care and Learning Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

# Declaring a concentration in Child Life Specialist

In order to pursue the Child Life Specialist concentration, students will review and sign a contract identifying the BPS requirements and the highly competitive expectations of a career in Child Life upon graduation.

Students applying for the Child Life Specialist program must have successfully completed or currently be enrolled in the courses below for consideration:

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

# Child Life Specialist Concentration (22 hours)

- CDFS 4240 Hospitalized Children and Their Families Credit Hours: (3)
- CDFS 4260 Child Life: Theory and Practice Credit Hours: (3)
- CDFS 4300 Play/Therapeutic Interventions Credit Hours: (4) w/Lab
- CLAS 3021 Medical Terminology Credit Hours: (3)
- PSYC 4513 Psychology of Grief/Loss Credit Hours: (3)

• UNIV 2110 - Field Experience Credit Hours: (1-6) /Child Life Practicum (Note: this course should be taken at the end of your sophomore year)

#### Choose one of the following:

- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)
- HCL 4010 Healthcare Stats/Research \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

# Guided Electives & Practicum (16 hours)

#### Group A: Family Dynamics - (3 hours)

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- SOCI 3831 Sociology of the Family\*\* Credit Hours: (3)
- UNIV 3535 Family Communication\*\* Credit Hours: (3)

#### Group B: Diverse Interactions - (3 hours)

- COUN 4621 Human Interactions Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3) Group C: Early Childhood - (3 hours)
- AUSP 4006 Language & Speech Development Credit Hours: (3)
- CDFS 3420 Play-Based Assessment for Young Children (0-4) Credit Hours: (3)
- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \*
- EDPR 4301 Early Child Dev/Begin Teacher Credit Hours: (3)

# \*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

#### Group D: Educational Context - (3 hours)

- ART 3411 Art for Children Credit Hours: (3)
- CDFS 4101 Int Curr for Early Learners Credit Hours: (3)
- ENGL 3401 Children's Literature Credit Hours: (3)

#### Group E: Field Experience (6 hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

You must complete a 600-hour unpaid internship under direct supervision of a Certified Child Life Specialist (CCLS). These Clinical Internships are highly competitive and can be completed outside of the city of Memphis at appropriate facilities. http://www.childlife.org/certification/students/requirements-after-2019. Apply early to guarantee an internship location.

325

If you are unable to complete this specific internship in your final two semesters, please contact your advisor to discuss an alternative plan for graduation outlined by the department.

# College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (25-31 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Disability Studies and Rehabilitation Services,** (B.P.S.)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Disability Studies and Rehabilitation Services are designed for students seeking to be academically and professionally grounded in issues faced by individuals seeking disability services. Students will also be exposed to the theme of employment – including vocational adjustment and appropriate job placement – and independent living outcomes as reaffirmed in the Rehabilitation Act Amendments of 1992. Rehabilitation depends heavily upon communication between both the consumer and professional and among various professionals; consequently, communication will be stressed, as well as an understanding of the potential influence of cultural diversity and individual lifestyle choices. Courses will also enable students to understand the methods used in disability services to solve consumer problems and utilize available resources. Finally, a well-supervised field experience component will provide students the opportunity to integrate classroom principles and develop entry-level skills in a work setting.

# General Education (35-41 hours)

See Graduation from the University for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (58 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core (19 hours)

- COUN 4901 Princ/Tech/Rehab Counseling Credit Hours: (3)
- COUN 4913 Medical/Psyc Aspects/Rehab Credit Hours: (3)
- COUN 4921 Vocational Dev/Occupation Info Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)
- SWRK 3903 Social Work Practice | Credit Hours: (4)

### Choose one of the following:

- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

### Statistics and Research Methods (3 hours)

- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

### Rehabilitation Delivery (12 hours)

- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- COUN 4783 Alcohol/Drug Abuse Services Credit Hours: (3)
- PADM 4207 Health Politics/Policy Credit Hours: (3)
- PETE 3308 Exceptional Learner Phys Ed Credit Hours: (3)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- SLS 3905 Leisure/Recr Disabilities Credit Hours: (3)

### Management Services (9 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PADM 4227 Issues/Nonprofit Admin Credit Hours: (3)

### Communications (6 hours)

### Group A: Professional Communications (3 hours)

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)

### Group B: Interpersonal Communications (3 hours)

- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)

#### Development and Aging (6 hours)

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- HMSE 4305 Problems/Health Sport Science Credit Hours: (1-3)
- LEAD 3350 The Adult Learner Credit Hours: (3)
- SOCI 3112 Contemporary Social Problems \*\* Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)
- SOCI 4852 Sociology of Mental Illness Credit Hours: (3)
- UNIV 4527 The Developing Adult \*\* Credit Hours: (3)

#### Internship (3 hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (12-18 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Early Care and Learning, (B.P.S)**

The Early Care and Learning (ECL) concentration provides a foundation for a career in working with young children (0-4) in early care and education and other applied settings.

Students who choose the ECL concentration are expected to develop knowledge and skills in child development and learning, observation and assessment, pedagogy and research through classroom and field experiences. Students will be prepared for employment in a discipline working with children and families, and may pursue graduate training that leads to careers in education, academia, research, health professions, or social work.

For information on careers in this and other disciplines students should consult the Career Services Office located on the 4th Wilder Tower, 678-2239.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (51 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate.

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at:

https://fcbeacad.memphis.edu/permits/.

### Child Development & Family Studies Core (21 hours)

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- CDFS 4223 Home/School/Comm Engage Credit Hours: (3)
- CDFS 4910 Ethics in Early Care and Learning Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

### Early Care and Learning Core (30 hours)

- AUSP 4006 Language & Speech Development Credit Hours: (3)
- CDFS 3410 Soc Emotion Lrng Early Child Credit Hours: (3)
- CDFS 3420 Play-Based Assessment for Young Children (0-4) Credit Hours: (3)
- CDFS 4101 Int Curr for Early Learners Credit Hours: (3)
- CDFS 4230 Math/Science Early Learning Credit Hours: (3)
- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \*
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

\*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (19-28 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

Interested in becoming a Registered Behavior Technician (RBT)? An RBT is a designation that can be obtained with appropriate coursework and successful completion of a competency assessment. Most RBTs work under the supervision and guidance of a Board Certified Behavior Analyst (BCBA). Courses consist of a four-course sequence (SPED 4111, 4112, 4113, & 4114), and can be completed entirely online. These courses can be added to any UofM major. The coursework will cover the basics of applied behavior analysis, as well as how to effectively measure, assess, and intervene with children, including those with autism.

# **Professional Studies, Early Intervention Specialist, (B.P.S.)**

The Bachelor of Professional Studies with a concentration in Early Intervention (ages 0-2) focuses on recognizing the uniqueness of the provision of instruction and/or service coordination in the field of Part C the Federal IDEA legislation for early intervention (ages 0-2). Students will learn how to promote caregiver-child interaction by assisting families to adapt routines and activities to support children's (ages 0-2) learning and interaction. In addition, students will be introduced to adult learning approaches to support caregivers and understand how cultural diversity affects family interactions and practices.

This program is designed to reflect professional standards set forth by the Council for Exceptional Children Division of Early Childhood. These standards are critical indicators of program quality and include:

- · Federal IDEA Part C Requirements;
- · Typical and atypical patterns of infant and toddler development and learning in all areas;
- · Functional assessment of development across domains;
- · Developmental disabilities in the birth-to-three population; and
- · Specialized instructional strategies to help young children (ages 0-2) learn.

This program prepares students to take the Tennessee Early Intervention Credential exams required to provide Developmental Therapy in the State of Tennessee.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (58 hours)

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Child Development & Family Studies Core (21 hours)

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- CDFS 4223 Home/School/Comm Engage Credit Hours: (3)
- CDFS 4910 Ethics in Early Care and Learning Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

# Early Intervention Specialist (12 hours)

- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- SPED 4111 Intro/Appl Behav Analysis Credit Hours: (3)
- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

# Early Intervention Specialist Core Supportive Competencies (12 hours)

- CDFS 3420 Play-Based Assessment for Young Children (0-4) Credit Hours: (3)
- ECED 4540 Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \*
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)
  - Requires dept. permit, SWRK 2010 or SWRK 2911 and BIOL 1010/BIOL 1011
- UNIV 3535 Family Communication\*\* Credit Hours: (3)

# \*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

### Guided Electives & Field Experience (13 hours)

### Group A: Family Dynamics (3 hours)

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- LEAD 3350 The Adult Learner Credit Hours: (3)
- SOCI 3831 Sociology of the Family\*\* Credit Hours: (3)
- SWRK 3903 Social Work Practice | Credit Hours: (4)

### Group B: Diverse Interactions (3 hours)

- AUSP 4006 Language & Speech Development Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

### Group C: Educational Context (3 hours)

- CDFS 4101 Int Curr for Early Learners Credit Hours: (3)
- ENGL 3401 Children's Literature Credit Hours: (3)
- SPED 3410 Disorders of Language Credit Hours: (3)
- SWRK 4937 School Social Work Credit Hours: (3)

### Group D: Field Experience: (4hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (12-18)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

Interested in becoming a Registered Behavior Technician (RBT)? An RBT is a designation that can be obtained with appropriate coursework and successful completion of a competency assessment. Most RBTs work under the supervision and guidance of a Board Certified Behavior Analyst (BCBA). Courses consist of a four-course sequence (SPED 4111, 4112, 4113, & 4114), and can be completed entirely online. These courses can be added to any UofM major. The coursework will cover the basics of applied behavior analysis, as well as how to effectively measure, assess, and intervene with children, including those with autism.

# **Professional Studies, Emergency Management, (B.P.S.)**

The interdisciplinary Emergency Management concentration is designed for students with a diversity of backgrounds and interest in applying that background to emergency management, community resilience to disaster, environmental hazards mitigation, emergency management response, and business continuity/disaster recovery. It will address the following critical knowledge elements: a) the physical and social dimensions of disasters through combining knowledge from various physical, social, and applied disciplines, b) the intersection of public policy to disaster risk, response, and mitigation, c) the intersection of the private, nonprofit, and governmental sectors and how this effects emergency preparedness, mitigation, and recovery, d) sustainable development, planning for and response to extreme events and change in our physical and human landscapes; and e) communication dynamics and persuasive communication in emergencies.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core (12 hours)

• EMGT 3100 - Seminar in Emergency Management Credit Hours: (3)

#### Choose one of the following:

- EMGT 4000 Internship Credit Hours: (3) \*
- CJUS 4100 Ind Dir Studies Credit Hours: (1-6)
- ESCI 4621 Investigations In GEOG Credit Hours: (1-3)

### Choose 6 hours from the following:

- CJUS 4126 CJUS Admin and Mgmt Credit Hours: (3)
- ESCI 4261 Plan Sustainable Cities/Region Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) \*NOTE: Junior level status required.
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 3611 Disaster Planning/Control Credit Hours: (3)
- PADM 3615 Community Risk Reduction Credit Hours: (3)

### Hazard/Risk Management (9 hours)

- ARCH 4451 Site/Environmental Planning Credit Hours: (3)
- CJUS 4190 Terrorism Soc/Legl Prsp \*\* Credit Hours: (3)
- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 3131 Severe Weather Credit Hours: (3)
- COMM 4211 Public Health Campaigns

### Human Systems (9 hours)

- ANTH 4511 Medical Anthropology Credit Hours: (3)
- COMM 3322 Theories of Persuasion \*\* Credit Hours: (3)
- COMM 4380 Communication and Conflict \*\* Credit Hours: (3) Or
- COMM 4410 Conflict Resolution and Negot\*\* Credit Hours: (3)
- PADM 4207 Health Politics/Policy Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3701 Individual and Society \*\* Credit Hours: (3)

### Analysis (3 hours)

- CJUS 3129 Statistical Methods/CJUS Credit Hours: (4)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- ESCI 4521 Quantitative Methods Credit Hours: (3)
- PADM 4101 Political Statistics Credit Hours: (3)
- POLS 4101 Political Statistics \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

### College Requirements (9 hours)

## Thematic Studies (6 hours)

Any UNIV 3500-3599 or UNIV 4500-4599 course, CSED 4300, CSED 4205, PHIL 3514 Students complete a total of 6 credit hours in a College of Professional & Liberal Studies thematic studies course(s) of their choosing. These courses are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Only specifically designated courses will meet this requirement. Students can complete one 6 credit hour class or two 3 credit hour courses. For a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on the topic they select.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (35-41 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Fashion Design, (B.P.S)

The Fashion Design concentration prepares students for careers in Fashion Design for the Apparel Industry. The curriculum fosters creative expression in all aspects of Fashion Design, including fashion sketching, creative design, computer applications, draping, and pattern drafting. With this, students learn to balance hand-making and digital skills with an integrated approach to design. The concentration is structured to challenge and inspire students by incorporating artistic, technical, and theoretical elements into a realistic approach to the Fashion Design Industry.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other

# Merchandising and Design Core (15 hours)

- MRCH 2000 Visual Imaging for Fashion and Merchandising Credit Hours: (3)
- MRCH 2010 Textiles Credit Hours: (3)
- MRCH 2300 Contemporary Design Mavens and Influencers Credit Hours: (3)
- MRCH 3000 Color and Basic Design Studies and Applications Credit Hours: (3)
- MRCH 3215 Textiles Applications Credit Hours: (3)

# Fashion Design Concentration (24 hours)

- MRCH 2005 Introd to the Fashion Industry Credit Hours: (3)
- MRCH 2200 Fashion Sketching and Illustration for Design Credit Hours: (3)
- MRCH 3075 Basic Industry Sewing and Construction Credit Hours: (3)
- MRCH 3100 Pattern Drafting | Credit Hours: (3)
- MRCH 3300 Draping Techniques Credit Hours: (3)
- MRCH 3400 Computer Aided Fashion Drawing and Design Credit Hours: (3)
- MRCH 3450 Computer Patternmaking Credit Hours: (3)
- MRCH 4000 Advanced Sewing Techniques Credit Hours: (3)
- MRCH 4400 Pattern Drafting II Credit Hours: (3)
- MRCH 4501 Fashion Sketching and Illustration for Design II/Collections Credit Hours: (3)
- MRCH 4550 Design and Fit Analysis Credit Hours: (3)
- MRCH 4575 Sourcing and Technical Design Credit Hours: (3)

# Guided Electives (18 hours)

Choose any remaining courses not taken from Fashion Design Concentration or appropriate upper division courses from Art, Theater, etc. Courses from other departments should be discussed with your advisor/program coordinator before registering to determine appropriateness.

# Senior Year Requirements (6 hours)

- MRCH 4600 Senior Seminar Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

- MRCH 4205 Behavioral Sci Aspects Clothng Credit Hours: (3)
- MRCH 3050 Costume History Credit Hours: (3)

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with The online catalog can be accessed at: http://catalog.memphis.edu/index.php 335 approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (7-13 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Fashion Merchandising (B.P.S.)**

Industry overview, financial planning and purchasing, visual presentation, color selection and coordination, textile identification, clothing characteristics, entrepreneurship and personal and professional development are all program components in this concentration.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Merchandising and Design Core (15 hours)

- MRCH 2000 Visual Imaging for Fashion and Merchandising Credit Hours: (3)
- MRCH 2010 Textiles Credit Hours: (3)
- MRCH 2300 Contemporary Design Mavens and Influencers Credit Hours: (3)
- MRCH 3000 Color and Basic Design Studies and Applications Credit Hours: (3)
- MRCH 3215 Textiles Applications Credit Hours: (3)

### Fashion Merchandising Concentration (24 hours)

- MRCH 2004 Tech Skills for Merchandising Credit Hours: (3)
- MRCH 2005 Introd to the Fashion Industry Credit Hours: (3)
- MRCH 2106 3D Visual Merchandising Credit Hours: (3)
- MRCH 3206 Merchandising Systems and Applications Credit Hours: (3)
- MRCH 3600 Consumer Engagement in the Digital Era Credit Hours: (3)
- MRCH 3650 Merchandise Buying Credit Hours: (3)
- MRCH 4560 Trend Analysis and Styling Concepts Credit Hours: (3)
- MRCH 4575 Sourcing and Technical Design Credit Hours: (3)

# Required Minor (18 hours)

• MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)

- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)

#### Choose six hours from the courses below:

- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4230 Services Marketing Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MKTG 4550 MKTG Business Solutions for Sustainability Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

### Senior Year Requirements (6 hours)

- MRCH 4600 Senior Seminar Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

- MRCH 3050 Costume History Credit Hours: (3)
- MRCH 4205 Behavioral Sci Aspects Clothng Credit Hours: (3)

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (7-13 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 uppder division hours.

# Professional Studies, Health Services (B.P.S.)

Students following guidelines for Health Services concentration are interested in the helping professions. This curriculum will prepare students for a wide range of health care positions in hospitals, health departments, health agencies, research facilities, schools and industry. This concentration is also for experienced health care professionals who have completed non-baccalaureate programs in health care specialties such as medical laboratory technology, respiratory therapy, radiological technology, and nursing who will build upon their training and experience by taking courses in such areas business practice, interpersonal skills, policy, risk management, social context of health care, and financial management.

## General Education (35-41 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

337 See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (48 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core (27 hours)

#### Group A: Administration & Supervision (3 hours)

- HCL 3000 Healthcare Leadership \*\* Credit Hours: (3)
- HETH 4211 Comm Healtcare Lead/Mgmt\*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

#### Group B: Human Resources Management (3 hours)

- HCL 4030 Healthcare Human Resources \*\* Credit Hours: (3)
- MGMT 3030 Mgmt/Service Organizatn\*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)

#### Group C: Financial (3 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 1220 Personal Financial Management Credit Hours: (3)
- HCL 3010 Healthcare Financial Mgmt \*\* Credit Hours: (3)
- MRCH 4300 Family Resource Management\*\* Credit Hours: (3)

#### Group D: Professional Writing (3 hours)

- ENGL 3134 Computer/Writing/Lit\*\* Credit Hours: (3)
- ENGL 3250 Professional Comm\*\* Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- HCL 3050 Prof Writing Healthcare \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

#### Group E: Research Methods (3 hours)

- HCL 4010 Healthcare Stats/Research \*\* Credit Hours: (3)
- HETH 4210 Healthcare Research Methods\*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

#### Group F: Health Communication (3 hours)

- COMM 3012 Health Communication \*\* Credit Hours: (3)
- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4016 Public Health Campaigns Credit Hours: (3)
- COMM 4410 Conflict Resolution and Negot\*\* Credit Hours: (3)
- HCL 3020 Healthcare Informatics \*\* Credit Hours: (3)

#### The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Group G: Policy and Social Context (3 hours)

- HCL 4000 Health Policy Issues \*\* Credit Hours: (3)
- HCL 4020 Law/Ethics of Healthcare \*\* Credit Hours: (3)
- HETH 4212 Trends/Issues in Healthcare\*\* Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)

#### Group H: Health Care Systems (3 hours)

- COMM 4015 Health Literacy Credit Hours: (3)
- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- HCL 3040 U S Health System \*\* Credit Hours: (3)
- HETH 4213 Community Health/Iss/Serv\*\* Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)

#### **Group I: Special Populations (3 hours)**

- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- AUSP 1010 Intro Amer Sign Lang | Credit Hours: (3)
- AUSP 1020 Intro Amer Sign Language || Credit Hours: (3)
- AUSP 4206 Deaf Culture and Deaf History Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3)
- HLSC 4100 Health and Aging Credit Hours: (3)
- HLSC 4300 Individuals with Disabilities and Special Needs Credit Hours: (3)
- SLS 3905 Leisure/Recr Disabilities Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)

# Health Care Specialty Guided Elective (21 hours)

NOTE: Must have 12 hours of Upper Division courses from this section.

- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- COBH 4707 International Health/Prob/Iss\*\* Credit Hours: (3)
- HCL 3020 Healthcare Informatics \*\* Credit Hours: (3)
- HCL 3030 Healthcare Strategic Plan/Mktg \*\* Credit Hours: (3)
- HCL 3040 U S Health System \*\* Credit Hours: (3)
- HCL 4020 Law/Ethics of Healthcare \*\* Credit Hours: (3)
- HCL 4040 Business Principles/Healthcare \*\* Credit Hours: (3)
- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)
- HMSE 2102 ARC First Aid and CPR Credit Hours: (3)
- LEGL 4200 Healthcare Liability Credit Hours: (3)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)
- SW 3170 Family Caregiving\*\* Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (22-28 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Human Services, (B.P.S.)

Students in the Human Services concentration are expected to develop a philosophical orientation to the human condition; to enlarge their understanding of social structures, values and norms; to study human growth and development; and to become informed about social change and social and bureaucratic organizations. Students in the Human Services concentration will take courses from such departments as Counseling and Personnel Services, Sociology and Social Work, Psychology, Management, and Special Education.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (45 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Basic Core (12 hours)

- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

### Professional Writing (3 hours)

• ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3)

- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)

#### Rehabilitation/Social Intervention (6 hours)

- CJUS 4152 Drug Misuse and Abuse Credit Hours: (3)
- COBH 4707 International Health/Prob/Iss\*\* Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- COUN 4783 Alcohol/Drug Abuse Services Credit Hours: (3)
- COUN 4901 Princ/Tech/Rehab Counseling Credit Hours: (3)
- COUN 4913 Medical/Psyc Aspects/Rehab Credit Hours: (3)
- COUN 4921 Vocational Dev/Occupation Info Credit Hours: (3)
- HETH 4212 Trends/Issues in Healthcare\*\* Credit Hours: (3)
- HETH 4213 Community Health/Iss/Serv\*\* Credit Hours: (3)
- SLS 3905 Leisure/Recr Disabilities Credit Hours: (3)
- SOCI 4852 Sociology of Mental Illness Credit Hours: (3)
- SW 3170 Family Caregiving\*\* Credit Hours: (3)
- SWRK 3920 Soc Welfare Policy/Programs Credit Hours: (3)
- UNIV 3534 Theatre & Therapy Credit Hours: (3)

#### Support Courses (21 hours)

- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4410 Conflict Resolution and Negot\*\* Credit Hours: (3)
- CRMJ 4520 Patterns of Domestic Abuse\*\* Credit Hours: (3)
- CRMJ 4530 Sociology of Murder\*\* Credit Hours: (3)
- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PSYC 3102 Abnormal Psychology Credit Hours: (3)
- PSYC 3103 Child Psychology \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3501 Sociology of Deviant Behavior \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)
- SOCI 4852 Sociology of Mental Illness Credit Hours: (3)
- UNIV 4527 The Developing Adult \*\* Credit Hours: (3)

### Internship (3 hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: For a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

341

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (Completed during the final semester)

# General Electives (25-31 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Information Technology (B.P.S.)

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in Information Technology can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of and fundamentals of administrative leadership in the technological fields; (2) to allow students to reflect upon national and international technological development and communication and the significant social and cultural issues raised in those contexts; and (3) to promote skills in information systems, statistical methods, formal and interpersonal communication, including team and organizational relations.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core (21 hours)

Group A. Administration and Supervision (3 hours)

- MGMT 3610 Princ Mgmt/Organ Behav\*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3) Group B. Organizational Systems (3 hours)
- PM 4120 Organization Theory and Behav\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3) Group C. Statistical Methods (3 hours)
- PBRL 4410 Public Relations Research Credit Hours: (3)
- SOAA 3350 Social Statistics\*\* Credit Hours: (3)
- SOCI 4510 Intro to Social Research\*\* Credit Hours: (3) Group D. Written Communications (3 hours)
- ENGL 3134 Computer/Writing/Lit\*\* Credit Hours: (3)
- ENGL 3250 Professional Comm\*\* Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

#### Group E. Team & Organizational Relations (3 hours)

- COMM 3010 Integrated Corp Comm\*\* Credit Hours: (3)
- COMM 4410 Conflict Resolution and Negot\*\* Credit Hours: (3)
- ORCO 3240 Organizational Comm\*\* Credit Hours: (3) Group F. International Context (3 hours)
- JOUR 4712 Media and Cultures\*\* Credit Hours: (3)
- POLI 4350 International Law\*\* Credit Hours: (3)
- PS 3510 Internl Political Economy\*\* Credit Hours: (3)
- POLS 3010 Comparative Politics\*\* Credit Hours: (3)
- SPAN 3550 Latin America Country & People\*\* Credit Hours: (3)

### Information Technology Concentration (15 hours)

- Group A: Management Information Systems Overview (3 hours)
- MGMT 3220 Mgmt of Info Systems\*\* Credit Hours: (3)
- PTMA 3020 Managing Information Tech\*\* Credit Hours: (3) Group B: Software (3 hours)
- UNIV 4706 Managing Software Development\*\* Credit Hours: (3) Group C: Files/Operativng Systems (3 hours)
- COMP 3050 Programming Languages\*\* Credit Hours: (3)
- INFS 3700 Systems Analysis and Design\*\* Credit Hours: (3) Group D: Database Management (3 hours)
- CSCI 3222 Database Mgmt System\*\* Credit Hours: (3)
- UNIV 4708 Business Intelligence\*\* Credit Hours: (3) Group E: Networks (3 hours)
- CSCI 4017 Intro to Information Assurance\*\* Credit Hours: (3)
- INFS 4900 Business Data Communications\*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Elective (34-40 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, International Organizational Leadership (B.P.S.)

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in International Organizational Leadership can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of bureaucratic organizations and the fundamentals of administrative leadership; (2) to allow students to reflect The online catalog can be accessed at: http://catalog.memphis.edu/index.php 343 upon national and international organizational context and upon significant social and cultural issues raised in those contexts; and (3) to promote skills in formal and interpersonal communication, including sensitivity to international issues and cultural diversity that have an impact upon the quality of work.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Professional Core and Organizational Leadership Concentration (36 hrs)

#### Professional Core (21 hours)

A. Administration and Supervision (3 hours)

- PADM 3601 Public Admin\*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- MGMT 3610 Princ Mgmt/Organ Behav\*\* Credit Hours: (3) B. Organizational Systems (3 hours)
- PM 4120 Organization Theory and Behav\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3) C. Statistical Methods (3 hours)
- PBRL 4410 Public Relations Research Credit Hours: (3)
- SOAA 3350 Social Statistics\*\* Credit Hours: (3)
- SOCI 4510 Intro to Social Research\*\* Credit Hours: (3) D. Written Communications (6 hours)
- ENGL 3134 Computer/Writing/Lit\*\* Credit Hours: (3)
- ENGL 3250 Professional Comm\*\* Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3) E. Team & Organizational Relations (3 hours)
- COMM 3010 Integrated Corp Comm\*\* Credit Hours: (3)
- ORCO 3240 Organizational Comm\*\* Credit Hours: (3) F. International Context (3 hours)
- JOUR 4712 Media and Cultures\*\* Credit Hours: (3)
- POLI 4350 International Law\*\* Credit Hours: (3)
- PS 3510 Internl Political Economy\*\* Credit Hours: (3)
- POLS 3010 Comparative Politics\*\* Credit Hours: (3)
- SPAN 3550 Latin America Country & People\*\* Credit Hours: (3)

#### International Organizational Leadership Concentration(15 hours)

- BMGT 3600 International Mgmt\*\* Credit Hours: (3)
- POLI 4350 International Law
- PS 3510 International Political Economy
- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- COMM 3560 Intercultural Communtn\*\* Credit Hours: (3)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (34-40 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Law Enforcement Administration, (B.P.S)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Law Enforcement Administration are designed for experienced law enforcement professionals who wish to further their careers by completing a program of study designed to increase their skills in management, organizational relations, and communication; their knowledge of the contexts within which law enforcement administration fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce. In most cases, candidates for this degree program will be active duty or retired law enforcement officers at the municipal, county, or state levels, though military police and, in certain circumstances, those whose experience is in private security are eligible as well.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (58 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

CJUS 1100 is a prerequisite for all other CJUS classes.

### Organization and Administration Required Core (12 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3) \*

Pick 1:

- CJUS 4126 CJUS Admin and Mgmt Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)

### Team Work and Organizational Relations (6 hours)

- COMM 3342 Communication and Leadership Credit Hours: (3)
- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- LEGL 3482 Labor Law Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)

### Written Communication (3 hours)

- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)

### Decision-Making (6 hours)

Group A: (3 hours)

- CJUS 3129 Statistical Methods/CJUS Credit Hours: (4)
- POLS 4101 Political Statistics \*\* Credit Hours: (3) /PADM 4101 (cross listed)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

#### Group B: (3 hours)

- CJA 3230 Police Org/Admin Credit Hours: (3)
- CJUS 3130 Research Methods CJUS \*\* Credit Hours: (3) \*
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

### Professional Ethics (3 hours)

- CJUS 4130 Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3)
- LEGL 2400 Legal Ethics Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- UNIV 3540 Ethics & Professionalism \*\* Credit Hours: (3)

### Urban Issues (6 hours)

- ANTH 4411 Urban Anthropology Credit Hours: (3)
- ANTH 4412 Neighborhood Development Credit Hours: (3)
- ESCI 3451 Intro/Urban Planning Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- SOCI 3112 Contemporary Social Problems \*\* Credit Hours: (3)
- SOCI 4631 Cities in Change Credit Hours: (3)

### Public Policy Issues (6 hours)

- CJUS 3226 Police in America \*\* Credit Hours: (3)
- LEGL 3487 Admin Law/Procedure Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- SOCI 4842 Sociology/Occup/Professions Credit Hours: (3)

#### Social Issues (3 Hours)

- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4460 Black/White Women in South Credit Hours: (3)

#### Behavioral Issues (3 hours)

- CJUS 3540 Criminology Credit Hours: (3)
- PSYC 3102 Abnormal Psychology Credit Hours: (3)
- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- SOCI 3701 Individual and Society \*\* Credit Hours: (3)

#### Pre Assessed Credit (10 hours)

A minimum of 10 hours of pre assessed experiential learning work from a POST certified training academy or Military MP training will be accepted with proper documentation. The 10 hours will be applied to the Coordinated Study.

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (12-17 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Legal Studies, (B.P.S.)

The Legal Studies concentration teaches theoretical and practical aspects of the field of law as a profession. Students are equipped to offer substantive legal support services to firms and agencies or to continue their education in law school. The core curriculum emphasizes four correlated disciplines: (1) theory, process, application, and ethics of law; (2) legal and administrative research and investigation; (3) law-related technologies, and (4) professional decorum and communication skills. Only licensed attorneys are permitted to practice law, but

well-trained paralegals and support staff are indispensable to any office that faces critical issues in law, regulatory compliance, or policy. The unique skill sets of Legal Studies graduates are vital not only to law firms but also to corporations, government agencies, courts, law enforcement, health care organizations, non-profits, educational institutions, and a wide range of other professional settings.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

No more than 15 hours of the Legal Studies Professional Core may be satisfied through transfer credit.

### Legal Studies Professional Core (30 hours)

- LEGL 2400 Legal Ethics Credit Hours: (3)
- LEGL 2410 Intro to Law Credit Hours: (3)
- LEGL 3150 Legal Research/Writing | Credit Hours: (3) \*
- LEGL 3410 Contracts Commercial Law Credit Hours: (3)
- LEGL 3420 Torts Credit Hours: (3)
- LEGL 3440 Civil Procedure Credit Hours: (3)
- LEGL 3484 Bankruptcy Practices Credit Hours: (3)
- LEGL 3486 Criminal Law & Procedure Credit Hours: (3)
- LEGL 4150 Legal Research Writing II Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6) \*\*

### Note

\* Students must complete LEGL 2400, LEGL 2410, and LEGL 3150 with a grade of C- or better before enrolling in any upper division (3000-4000 level) LEGL courses.

\*\* A permit is required to enroll in UNIV 4110 - Internship\*\*. The program coordinator approves internships and issues permits. In order to be eligible, students must have earned (1) ninety credit-hours and (2) a grade of C- or better in both LEGL 3150 - Legal Research/Writing I and LEGL 4150 - Legal Research Writing II. The internship requires students to perform 150 clock-hours of substantive legal work within a professional legal environment. Although the academic advisors and the program coordinator are available to assist however possible, it is each student's responsibility to find, apply for, and secure his/her own internship prior to seeking a permit for UNIV 4110. Students cannot transfer credit for internships from other schools or programs unless the student and the internship both meet UM's Legal Internship standards, as determined by the program coordinator. For more information and related forms and documents, please visit https://www.memphis.edu/cpls/pdfs/UNIV4110\_Legal\_Studies\_Internship\_Packet.pdf.

### Law-Related Electives (12 hours)

- LEGL 3400 Estates and Probates Credit Hours: (3)
- LEGL 3430 Business Associations Credit Hours: (3)
- LEGL 3481 Family Law Credit Hours: (3)

- LEGL 3482 Labor Law Credit Hours: (3)
- LEGL 3485 Real Estate Practices Credit Hours: (3)
- LEGL 3487 Admin Law/Procedure Credit Hours: (3)
- LEGL 4000 Evidence and Argument Credit Hours: (3)
- LEGL 4200 Healthcare Liability Credit Hours: (3)
- LEGL 4300 Immigration Law Credit Hours: (3)
- POLS 4709 Mock Trial Credit Hours: (3-6) \*

### Note

\*Mock trial is a specialty course offered by the Political Science Department. It is limited to students who audition and are selected for the UM Mock Trial team, which sometimes travels for regional competitions. Eligible students may take the course twice for a total of six credit hours, but only in consecutive semesters (fall and then spring). For more information on permits, auditions, requirements, and offerings, please contact the Political Science Department.

### Interdisciplinary Electives (12 hours)

Legal Studies students must also take at least 12 hours (four classes) of Interdisciplinary Electives. This course group is meant to offer students the freedom to shape their own learning experience while still adhering to a central theme of modern legal systems in society.

Students seeking to enroll in courses outside the College of Professional & Liberal Studies must obtain the appropriate permits from the department offering the course. Note that **all** upper-division courses offered by the Fogelman College of Business and Economics require a permit (3000 or 4000-level ACCT, ECON, FIR, MGMT, MKTG). To request a permit for courses at Fogelman College, please visit fcbeacad.memphis.edu/ugad/permits. Many upper-division courses in other departments also have prerequisites or permit restrictions. Students are responsible for knowing and satisfying all course requirements prior to enrollment. For specific information about course descriptions and prerequisites, please see the Undergraduate Catalog, which is available online at Courses-Undergraduate.

- ACCT 3011 Business Law \*\* Credit Hours: (3)
- CJUS 3426 Corrections in America \*\* Credit Hours: (3)
- CJUS 3510 Law and Society Credit Hours: (3)
- CJUS 3521 Constitutional Crmnl Procedure \*\* Credit Hours: (3)
- CJUS 4130 Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3)
- CJUS 4170 Prevention/Deterrence Crime Credit Hours: (3)
- CJUS 4520 Criminal Law Credit Hours: (3)
- CJUS 4531 Constitutional Law Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3) \*
- HIST 3840 U S Constitutional History Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)
- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 4551 Social and Political Philosophy Credit Hours: (3)
- POLS 3402 Legal/Political Thght Modern Credit Hours: (3)
- POLS 4200 Envrnmntl Law/Policy/Regulatn Credit Hours: (3)
- POLS 4211 Const Law/National Powers Credit Hours: (3)
- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)

#### • SOCI 3541 - Criminology Credit Hours: (3)

\*Legal Studies Students may receive degree credit for either LEGL 3485 - Real Estate Practices or FIR 4310 - Real Estate Law \*\*, but not both.

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

Please note that the Legal Studies Senior Project does not involve the same materials and assignments as the Senior Project for students in other fields of study. Instead of an academic research paper, Legal Studies students analyze a case file and conduct independent legal research to draft a full-length trial brief that is suitable for attorney signature and filing with the court. For more information about the Legal Studies section of Senior Project, please email legalstudies@memphis.edu. For permit and registration information, please contact your academic advisor or the Senior Project Coordinator.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (16-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Manufacturing Technology Management, (Lambuth Campus Only) (B.P.S)

The Bachelor of Professional Studies degree (BPS) with a concentration in Manufacturing Technology Management offers career and advancement opportunities in the manufacturing industry.

The interdisciplinary focus on manufacturing supervisory skills will assist students in advancing their manufacturing careers for those already working in the industry.

Students will learn skills in project planning and evaluation, work design improvement, production control, facility design, occupational safety, and statistical quality control. In addition, they will learn principles of supervision and other management skills.

Those currently in the industry also have the opportunity to use existing work experience for college credit through Experiential Learning Credit.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Manufacturing Technology Concentration (27 hours)

- TECH 3386 Occupational Safety Credit Hours: (3)
- TECH 3440 Project Plan/Cost Evaluation Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- TECH 4460 Work Design/Improvement Credit Hours: (3)
- TECH 4462 Quality Improvement Credit Hours: (3)
- TECH 4464 Production Control Systems Credit Hours: (3)
- TECH 4466 Facility Design Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6) (6)

### Management Services (27 hours)

### Administration and Supervision (3 hours)

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)

### Organizational Systems (3 hours)

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PSYC 3508 Indust/Organizatnl Psyc Credit Hours: (3)

Marketing and Public Relations (3 hours)

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)

Team and Organizational Relations (3 hours)

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)

### Written Communication (3 hours)

• ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3)

- ENGL 3602 Professional Editing \*\* Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

#### Social & Cultural Context (3 hours)

- CJUS 4180 Corporate/White Collar Crime \*\* Credit Hours: (3)
- COMM 3003 Television and Culture\*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 3831 Sociology of the Family\*\* Credit Hours: (3)

Political & Economic Context (3 hours)

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- HIST 4824 Business History Credit Hours: (3)
- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)

#### Technology & Culture (3 hours)

- COMM 4014 Communication on the Internet \*\* Credit Hours: (3)
- HIST 3035 Technology/Culture Am History\*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academicareas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### Electives (16-22 Hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# <sup>352</sup> Professional Studies, Music & Entertainment (Lambuth Campus Only), (B.P.S)

The Music and Entertainment (ME) concentration is an interdisciplinary program fusing three areas of study: music, business, and technology. This concentration will provide students an understanding of fundamentals in commercial music and will provide them the knowledge to gain employment in the entertainment field.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (55 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Music Core (19 hours)

- MUTC 3701 Theory/Musicianship | Credit Hours: (3) \*
- MUTC 3702 Theory/Musicianship II Credit Hours: (3) \*
- MUS 1030 Introduction to Music\*\* Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUAP elective-Ensemble or Applied (4 hours)

\*These courses have been approved only for Lambuth Campus.

# Entertainment Core (18 hours)

- MUID 3704 Recording Studio Tech/Practice Credit Hours: (3)
- MUID 3705 Cont Sngwrting/Prod Techniques Credit Hours: (3)
- MUID 4201 Studies in Commercial Music Credit Hours: (1-3) \*
- MUID 4701 Music Licensing/Publishing Credit Hours: (3) \*
- COMM/MUID/UNIV Elective in Entertainment
- UNIV 4110 Internship\*\* Credit Hours: (3-6) (1-6 hours) \*These courses have been approved only for Lambuth Campus.

# Business Core (18 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- Elective- 3 hours Business/Marketing/Mgmt Elective (Upper Division)

- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (15-21 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Non-Profit Development and Administration, (B.P.S.)**

The goal of this concentration's interdisciplinary curriculum is to help persons understand the role of nonprofit in society and to prepare them to organize, develop, and administer nonprofit organizations. Nonprofit organizations include educational, scientific, religious, and other charitable organizations as well as private foundations, community-based organizations, professional and fraternal associations, and civic and social organizations. The guidelines are designed to serve persons who have worked, or who want to work, within the nonprofit sector as employees, or have served in the community as volunteers. They will want to learn how nonprofit organizations serve the community, to learn about their operation, and their constituencies, and to improve or develop administrative skills in order to work in the nonprofit sector. Persons who wish to enter the nonprofit sector or make a career change will also be served by these guidelines. Graduates of the program will likely enter such careers as communications director, volunteer director, or program director for a nonprofit agency. This curriculum can also prepare for graduate study in master's degree programs in the fields of public administration, applied anthropology, business administration and social work.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (60 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other

# Core Courses (15 hours)

- ANTH 4412 Neighborhood Development Credit Hours: (3) or
- ANTH 3282 American Communities \*\* Credit Hours: (3)
- ECON 3411 Economics of Social Issues
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)

### Historical Context (3 hours)

- HIST 3274 Islamic History since 1405 Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4831 History American Family \*\* Credit Hours: (3)
- HIST 4851 History of Women in America \*\* Credit Hours: (3)
- HIST 4863 History/Childhood in America \*\* Credit Hours: (3)
- HIST 4871 U S Urban History Credit Hours: (3)

### Social, Political, Economic Context (6 hours)

#### Choose 2 courses from at least two different disciplines:

- ANTH 4411 Urban Anthropology Credit Hours: (3)
- CJUS 1100 Intro/Criminal Justice \*\* Credit Hours: (3)
- COMM 4381 Senior Capstone \*\* Credit Hours: (3)
- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- COUN 4783 Alcohol/Drug Abuse Services Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- POLS 3211 State/Local Government Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4223 Issues/Urban Politics Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)

### Nonprofit Work Setting (3 hours)

- ESCI 3451 Intro/Urban Planning Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)
- SLS 3103 Outdoor Rec/Ed Urban America \*\* Credit Hours: (3)
- SLS 3205 Venue Planning and Management Credit Hours: (3)
- SLS 3905 Leisure/Recr Disabilities Credit Hours: (3)
- SOCI 3860 Sociology of Religion\*\* Credit Hours: (3)

### Marketing & Fund-raising (3 hours)

- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 4230 Services Marketing Credit Hours: (3)

### Human Resources (3 hours)

- COUN 4621 Human Interactions Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- SLS 3204 Org Analysis Sport/Leisure \*\* Credit Hours: (3)

### Program Evaluation (3 hours)

- ANTH 4010 Ethnographic Methods Credit Hours: (3)
- COMM 3330 Communication Research Methods \*\* Credit Hours: (4)
- PADM 4101 Political Statistics Credit Hours: (3)
- SLS 3305 Leisure/Recreation Prog Devlp \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

### Accounting (3 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)
- ACCT 4540 Govt/Health/Non-Profit Credit Hours: (3)
- PADM 4227 Issues/Nonprofit Admin Credit Hours: (3)
- SLS 3605 Financial Management SLS \*\* Credit Hours: (3)

### Legal Environment (3 hours)

- ACCT 3011 Business Law \*\* Credit Hours: (3)
- LEGL 2410 Intro to Law Credit Hours: (3)
- POLS 3405 Intro Law/Jurisprudence Credit Hours: (3)
- SLS 4205 Legal Aspects SLM \*\* Credit Hours: (3)

### Communication (3 hours)

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)

### Computer Use & Technology (3 hours)

• JRSM 3900 - Visual Media \*\* Credit Hours: (3)

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SLS 3005 Computer Applctn Sport/Leisure \*\* Credit Hours: (3)

#### Internship (6 Hours)

- PADM 4231 Admin Internship Credit Hours: (3-12)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (6-12 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Organizational Leadership, (B.P.S.)

The concentration in Organizational Leadership is designed to (1) promote understanding of the nature of organizations and the fundamentals of administrative leadership; (2) allow students to reflect upon national and international organizational contexts and upon significant social and cultural issues raised in those contexts; and (3) promote skills in formal and interpersonal communication, including sensitivity to personal issues having an impact upon the quality of accomplishment in the work place.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Administration and Supervision (3 hours)

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)

### Organizational Systems (3 hours)

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)

### Statistical and Research Methods (3 hours)

- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- PADM 4101 Political Statistics Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

### Written Communications (3 hours)

- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

### Team and Organizational Relations (3 hours)

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4341 Interpersonal Communication \*\* Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COMM 4380 Communication and Conflict \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)

### Political and International Context (3 hours)

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- ACCT 3011 Business Law \*\* Credit Hours: (3)
- HIST 3212 Latin American History since 1808 Credit Hours: (3)
- HIST 3274 Islamic History since 1405 Credit Hours: (3)
- HIST 3291 Modern Asia Credit Hours: (3)
- HIST 3302 Modern Europe 1800-Present \*\* Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- POLS 3302 West Europe Govt/Politics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3309 Govt/Politics of Mid East \*\* Credit Hours: (3)
- POLS 3509 Contmp Prblm Intl Relation Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)

### Organizational Leadership Concentration (15 hours)

NOTE: No more than 3 courses from any one area

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3) \*
- COUN 4611 Intro to Counseling Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3) \*
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- LEAD 3350 The Adult Learner Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3) \*
- PADM 3601 Public Admin\*\* Credit Hours: (3) \*
- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3) \*
- PSYC 3101 Psychology of Personality Credit Hours: (3)
- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (37-43)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Preschool & Child Care Administration, (B.P.S.)

These guidelines for a Bachelor of Professional Studies with a concentration in Preschool and Child Care Administration are designed for persons seeking careers in the administration of early childhood programs including childcare centers, both for-profit and non-profit; private and public pre-kindergarten programs; Head Start; pre-schools; parents' day out programs; before and after school care; and centers for children with special needs. Also served by these guidelines are persons with experience in childcare settings from a wide variety of backgrounds, including childcare volunteers and aides, as well as teachers and directors. In addition to core content in early childhood professional knowledge, there is course work to develop skills in fiscal management, recruiting and hiring personnel, health and safety management, board relations, marketing and public relations, and liaison with professional associations and regulatory agencies.

This Program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: <u>http://www.memphis.edu/tep/</u>.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (63 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Child Development and Family Studies (21 hours)

NOTE: No more than 6 hours may be substituted in this section

- CDFS 2100 Intro Fld of Chld Dev & Fam St Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- CDFS 4223 Home/School/Comm Engage Credit Hours: (3)
- CDFS 4910 Ethics in Early Care and Learning Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

### Educational Context (9 hours)

- AUSP 4006 Language & Speech Development Credit Hours: (3)
- CDFS 3420 Play-Based Assessment for Young Children (0-4) Credit Hours: (3)
- CDFS 4101 Int Curr for Early Learners Credit Hours: (3)
- EDPR 4301 Early Child Dev/Begin Teacher Credit Hours: (3)
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)

### Families and Culture (9 hours)

#### Group A: 3 hours

- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

#### Group B: (3 hours)

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4411 Urban Anthropology Credit Hours: (3)
- HIST 4831 History American Family \*\* Credit Hours: (3)
- HIST 4863 History/Childhood in America \*\* Credit Hours: (3)
- SOCI 3831 Sociology of the Family\*\* Credit Hours: (3)

### Group C: (3 hours)

- HIST 4851 History of Women in America \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4460 Black/White Women in South Credit Hours: (3)

Program Administration (21 hours)

Fiscal Management (6 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)

Human Resource Management (6 hours)

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)

Health and Safety Management (6 hours)

- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- HMSE 2102 ARC First Aid and CPR Credit Hours: (3)

Marketing and Public Relations (3 hours)

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)

### Internship (3 hours)

• UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (7-13 hours)

# **Professional Studies, Technology Management Services - (B.P.S)**

The concentration in Technology Management Services is designed for experienced technicians who wish to enhance their technical expertise while at the same time increasing their skills in management, organizational relations, and communication; their knowledge of contexts within which the management of technology fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Technology Concentration: 24 hours (12 hours must be upper division)

# This includes courses taken from such departments as

- Engineering
- Engineering Technology
- Manufacturing Engineering
- Architecture
- Mathematics
- Computer Science
- Biology
- Chemistry
- Physics
- Earth Sciences
- and other approved courses.

# NOTE:

It is assumed that students will take all technology concentration courses from one area. Students wishing to take a combination of classes from the above areas need permission of the College of Professional & Liberal Studies executive dean. A limited number of classes from

# Management Services (30 Hours)

# Administration and Supervision (3 Hours)

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- TECH 4381 Principles of Supervision\*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)

# Organizational Systems (3 Hours)

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)

wishing to pursue a career in information technology or management information systems should major in these areas.

- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PSYC 3508 Indust/Organizatnl Psyc Credit Hours: (3)

### Marketing and Public Relations (3 Hours)

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)

# Administrative Skills (3 Hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)

### Statistical & Research Methods (3 Hours)

- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)

# Team and Organizational Relations (3 Hours)

- COMM 4011 Communication in Organizations \*\* Credit Hours: (3)
- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)

# Written Communication (3 Hours)

- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ENGL 3602 Professional Editing \*\* Credit Hours: (3)
- ENGL 3603 Engineering Communications Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)

### Social & Cultural Context (3 Hours)

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4412 Neighborhood Development Credit Hours: (3)
- CJUS 4180 Corporate/White Collar Crime \*\* Credit Hours: (3)
- COMM 3003 Television and Culture\*\* Credit Hours: (3)
- SLS 3105 Sport/Leisure as Pop Culture \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 3831 Sociology of the Family\*\* Credit Hours: (3)
- SOCI 4631 Cities in Change Credit Hours: (3)

### Political & Economic Context (3 Hours)

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- HIST 4824 Business History Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)
- ESCI 4430 Economic Geography Credit Hours: (3)

#### Technology & Culture (3 hours)

- COMM 4014 Communication on the Internet \*\* Credit Hours: (3)
- HIST 3035 Technology/Culture Am History\*\* Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)

# College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (6-22)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

365

# **Professional Studies, Visual Merchandising and Exhibition Design** (B.P.S.)

The Visual Merchandising and Exhibition Design concentration is an interdisciplinary program and comprises developing environments such as homes, stores, display windows and other merchandise displays; as well Exhibition Design, including trade shows and installations at large scale events, like pop-up stores.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Merchandising and Design Core (15 hours)

- MRCH 2000 Visual Imaging for Fashion and Merchandising Credit Hours: (3)
- MRCH 2010 Textiles Credit Hours: (3)
- MRCH 2300 Contemporary Design Mavens and Influencers Credit Hours: (3)
- MRCH 3000 Color and Basic Design Studies and Applications Credit Hours: (3)
- MRCH 3215 Textiles Applications Credit Hours: (3)

# Visual Merchandising & Exhibition Design Concentration (24 hours)

- MRCH 2004 Tech Skills for Merchandising Credit Hours: (3)
- MRCH 2050 Computer Applications for VMED Credit Hours: (3)
- MRCH 2106 3D Visual Merchandising Credit Hours: (3)
- MRCH 3010 Trends in Home and Exhibition Credit Hours: (3)
- MRCH 3220 Materials Exploration Credit Hours: (3)
- MRCH 3600 Consumer Engagement in the Digital Era Credit Hours: (3)
- MRCH 3700 Strategic Design for Residential Space Credit Hours: (3)
- MRCH 4200 Strategic Design for Exhibition Space Credit Hours: (3)

# Senior Year Requirements (6 hours)

- MRCH 4600 Senior Seminar Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)

# College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

- MRCH 3050 Costume History Credit Hours: (3)
- MRCH 4205 Behavioral Sci Aspects Clothng Credit Hours: (3)

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

• UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (25-31 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper division hours.

# Psychology, (B.A.)

Program objectives for a B.A. in Psychology are: (a) describe the nature of psychology as a discipline; (b) use the concepts, language, and major theories of the discipline to account for psychological phenomena; (c) demonstrate knowledge and understanding representing appropriate breadth and depth in selected content areas of psychology; (e) describe the basic characteristics of the science of psychology; (f) explain different research methods used by psychologists; (g) design and conduct basic studies to address psychological questions using appropriate research methods; (h) evaluate the appropriateness of conclusions derived from psychological research; (i) generalize research conclusions appropriately based on the parameters of particular research methods; (j) follow the APA Code of Ethics in the treatment of human and nonhuman participants in the design, data collection, interpretation, and reporting of psychological research; (k) use critical thinking effectively; (l) use reasoning to recognize, develop, defend, and criticize arguments and other persuasive appeals; (m) approach problems effectively; (n) describe major applied areas of psychology (e.g., clinical, counseling, industrial/organizational, school, health); (o) identify appropriate applications of psychology in solving problems; (p) articulate how psychological principles can be used to explain social issues and inform public policy; (q) recognize the necessity for ethical behavior in all aspects of the science and practice of psychology; (s) recognize and understand the importance of academic integrity; (t) recognize and respect human diversity and understand that psychological explanations may vary across populations and contexts; (u) assess and justify engagement with respect to civic, social, and global responsibilities; (v) understand the limitations of psychological knowledge and skills.

367

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (35 hours in Psychology)

# Completion of

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- PSYC 1300 Careers in Psychology \*\* Credit Hours: (1)
- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- PSYC 3020 Research and Statistics II \*\* Credit Hours: (4)

One Course from Each of the Three Content Areas Below:

Cognitive and Neuroscientific Bases of Behavior:

- PSYC 3303 Thinking/Cognitive Processes \*\* Credit Hours: (3)
- PSYC 3304 Perceptual Psychology Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3307 Animal Behavior \*\* Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3530 Psychology of Language Credit Hours: (3)
- PSYC 4305 Mind/Brain/Intelligence \*\* Credit Hours: (3)

Social and Developmental Bases of Behavior:

- PSYC 3103 Child Psychology \*\* Credit Hours: (3)
- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- PSYC 3236 Psychology of Gender Credit Hours: (3)
- PSYC 3506 Human Sexuality Credit Hours: (3)
- PSYC 4034 Children Soc Relationships Credit Hours: (3)
- PSYC 4102 Abnormal Child Psych Credit Hours: (3)

### Applications of Behavior:

- PSYC 3508 Indust/Organizatnl Psyc Credit Hours: (3)
- PSYC 3509 Applying Psyc/Community Credit Hours: (3)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- PSYC 3520 Legal/Forensic Psyc Credit Hours: (3)
- PSYC 4401 Intro to Clinical Psychology \*\* Credit Hours: (3)
- PSYC 4507 Psyc Internship Credit Hours: (3)

# Two of the Following 4-hour Lab Courses

- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)

# **Psychology Field Test**

All majors must take a Psychology Field Test during their senior year.

# Concentrations (24 hours):

The department offers three concentrations: (a) General Psychology (b) Behavioral Neuroscience (c) Cognitive Science. Students must complete the requirements for one concentration.

### General Psychology:

Completion of requirements above and additional upper division hours in PSYC to bring the PSYC total to at least 35 hours.

### Behavioral Neuroscience:

Completion of requirements above

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1120 General Biology II Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 4505 Special Prob/Behav Neurosci Credit Hours: (3)
- PSYC 4506 Direct Rsch Behav Neuro Credit Hours: (3)
- PSYC 4997 Senior Thesis/Behav Neurosci Credit Hours: (3)
- additional upper division hours in PSYC courses to bring their PSYC total to at least 35 hours.

### Cognitive Science:

Completion of requirements above;

• PSYC 3303 - Thinking/Cognitive Processes \*\* Credit Hours: (3)

#### At Least One Course From Either

• PSYC 3103 - Child Psychology \*\* Credit Hours: (3)

• PSYC 3106 - Social Psychology \*\* Credit Hours: (4)

At Least Two Courses From:

- PSYC 3304 Perceptual Psychology Credit Hours: (3)
- PSYC 3305 Psyc Learning/Memory\*\* Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3530 Psychology of Language Credit Hours: (3)
- PSYC 4305 Mind/Brain/Intelligence \*\* Credit Hours: (3)
- PSYC 4998 Sr Thesis/Cognitive Science Credit Hours: (3) or
- PSYC 4999 Honors Sr Thesis/Cognitive Sc Credit Hours: (3)
- additional upper division hours in PSYC courses to bring their PSYC total to at least 35 hours.

#### Students Choosing Cognitive Science Concentration

Students choosing Cognitive Science concentration must complete at least three of the following courses outside of psychology:

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- ENGL 3511 Intro to Linguistics \*\* Credit Hours: (3)
- IIS 1010 Intro to Intelligent Systems Credit Hours: (3)
- PHIL 3460 Nature/Mind/Knowledge Credit Hours: (3)
- PHIL 3621 Intermediate Logic Credit Hours: (3)
- PHIL 4421 Philosophy of Mind Credit Hours: (3)

# Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

The Psychology Honors Program provides an opportunity for selected Psychology majors to enrich their learning experience through honors courses, independent study, a senior thesis, and extracurricular learning experiences. The program requires a minimum of 15 credit hours of honors work in psychology. Students who earn at least a 3.25 cumulative grade point average in the major will earn degrees that included the distinction "With Honors in Psychology." Please contact the department honors coordinator for more detailed information about the Psychology Honors Program and assistance in applying. Psychology majors may also be eligible to participate in the University Honors Program described elsewhere in this bulletin. Some psychology honors courses may be counted toward the requirement of the University Honors Program.

Psychology Honors Classes. The honors courses described below are open only to students in good standing in the Psychology Honors Program or the University Honors Program. Honors courses in Psychology include: (1) PSYC 1030 (General Psychology - Honors). Students who wish to enroll in this course during their first year may do so either by meeting the requirements for the University Honors Program or by instructor permission; (2) periodically offered honors sections of other courses in the psychology curriculum; (3) specialized honors courses; (4) Honors Special Topics; (5) Directed Research and Senior Thesis.

Psychology Honors Contracts. Students may ask the instructor of any psychology course to negotiate an honors contract, in which the instructor and student agree on additional honor-level requirements for the course.

Psychology Honors Senior Thesis. Students ask a psychology faculty member to serve as adviser for PSYC 4996 - Honors Senior Thesis, typically completed during the student's last semester. Before enrolling in PSYC 4996, the student should complete at least one semester of PSYC 4504 - Directed Research under the same faculty adviser who will oversee work in the honors thesis. Students specializing in Behavioral Neuroscience may choose to enroll in PSYC 4506 (Directed Research in Behavioral Neuroscience) and PSYC 4997 (Senior Thesis in Behavioral Neuroscience). The completed thesis is presented in writing and defended orally before a faculty committee.

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- PSYC 1300 Careers in Psychology \*\* Credit Hours: (1)
- Foreign Language/B.A. (3)
- Elective (ACAD 1100) (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Humanities (3) \*
- PSYC Content Area 1 (3)
- Elective (3)
- Foreign Language/B.A. (3)

### Semester Totals 31-32 hrs

# Sophomore Year

- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PSYC Content Area 2 (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- PSYC 3020 Research and Statistics II \*\* Credit Hours: (4)
- PSYC Content Area 3 (3)
- History (3) \*
- Foreign Language/B.A. (3)

### Semester Totals 29 hrs

### Junior Year

- Fine Arts (3) \*
- UD PSYC (3)
- Natural Science (4) \*
- Elective (3)
- Elective (3)
- History (3) \*
- UD PSYC (3)
- Elective (3)
- Social/Behavioral Sciences (3) \*
- Elective (3)

### Semester Totals 31 hrs

# Senior Year

- UD PSYC w/lab (4)
- Elective (3)
- Elective (3)
- UD Elective (3)
- UD Elective (2)
- UD PSYC w/lab (4)
- Natural Science (4) \*
- UD Elective (3)
- UD Elective (3)

### Semester Totals 29 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Public Health (BSPH)**

Public health is an interdisciplinary field encompassing the science and practice of promoting the health and well-being of communities and populations. This happens through such approaches as health education, health analytics, identifying and addressing social and other determinants of health, preventive interventions and services, and the monitoring and control of communicable diseases and environmental hazards.

The Bachelor of Science in Public Health major at the University of Memphis is designed to provide students with a strong foundation in public health through evidence-informed course content; a curriculum based on established competencies, best practices, and accreditation standards; and community-based internships and practicum experiences. The Public Health B.S. degree is recommended for students planning to pursue a career or continue graduate education in Public Health or related biomedical fields.

**UMdegree**You can review information regarding your current academic pursuits, including Degree Requirements, General Education Requirements, Major/Concentration Requirements, and Minor Requirements by accessing the UMdegree audit tool. This tool reflects all changes to a student's academic record and is used in determining whether or not a student has successfully completed all graduation requirements. www.my.memphis.edu

**Program Summary for BSPHI.** General Education 41 hours**II.** Integrated Public Health Core 30 hours**III.** Interdisciplinary Core 15 hours**IV.** Field Experience & Capstone 5 hours**V.** Guided Electives 12 hours**VI.** General Electives 17 hours**Minimum Required for Graduation: 120 hours**Students must complete at least 62 hours of upper-division credit (3000 or 4000-level).Students must complete at least 30 of the last 60 hours through the University of Memphis.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# Integrated Public Health Core (30 hours)

- PUBH 3120 Environmental Health 1: Basics & Method Credit Hours: (3)
- PUBH 3130 Introduction to Social Determinants of Health Credit Hours: (3)
- PUBH 3150 Analytic and Research Methods in Public Health I Credit Hours: (3)
- PUBH 3180 Public Health Principles & Practices | Credit Hours: (3)

- PUBH 3710 Public Health Systems & Policy I Credit Hours: (3)
- PUBH 4121 Environmental Health II: Practice and Application Credit Hours: (3)
- PUBH 4131 Social Justice & Public Health Credit Hours: (3)
- PUBH 4151 Analytic and Research Methods in Public Health II Credit Hours: (3)
- PUBH 4181 Public Health Principles & Practices II Credit Hours: (3)
- PUBH 4711 Public Health Systems & Policy II Credit Hours: (3)

# Interdisciplinary Core (15 hours)

- ANTH 4511 Medical Anthropology Credit Hours: (3)
- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- COMM 4015 Health Literacy Credit Hours: (3)
- HLSC 4200 Cultural Competence in Health Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

# Field Experience & Capstone (5 hours)

- PUBH 4010 Field work Credit Hours: (2)
- PUBH 4985 Capstone Experience Credit Hours: (3)

### Senior Capstone Experience (3 hours)

The senior Capstone Experience is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to coalesce the theoretical and applied areas of study into an academically-relevant example of scholarship. Students will complete research on a topic of their choice with approval of their senior project instructor. The senior capstone project is completed during a student's final semester and includes a completed e-portfolio.

# Guided Electives: (12 hours)

Select at least four (4) courses from the list below:

- PUBH 3101 Environ Health in the Media Credit Hours: (3)
- PUBH 3102 Epidemics: The Plague to Ebola Credit Hours: (3)
- ANTH 3500 Anth of Global Health \*\* Credit Hours: (3)
- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4111 Evolution and Human Health Credit Hours: (3)
- ANTH 4417 Food, Culture, Power Credit Hours: (3)
- ANTH 4521 Culture, Soc & Mental Health Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- CDFS 3401 Parent Child Relations Credit Hours: (3)
- CDFS 3410 Soc Emotion Lrng Early Child Credit Hours: (3)
- CJUS 4460 Race, Ethnicity and Justice in America Credit Hours: (3)
- COMM 4016 Public Health Campaigns Credit Hours: (3)
- HLSC 4100 Health and Aging Credit Hours: (3)
- NUTR 4602 Community Nutrition Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)
- SWRK 4061 Substance Abuse Treatment Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)

# General Electives: (17 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 62 upper-division hours.

# Total Hours Required for Graduation: 120

- Students must complete at least 62 hours of upper-division credit (3000 or 4000-level).
- Students must complete at least 30 of the last 60 hours through the University of Memphis.

# **Public Relations - (B.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# Journalism and Strategic Media Core (18 hours)

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)

### Core Elective

Select one of the following (3 hours):

- JRSM 4702 Media, Diversity & Society \*\* Credit Hours: (3)
- JRSM 4704 Issues in Sport and Media Credit Hours: (3)
- JRSM 4708 Media Ethics Credit Hours: (3)
- JRSM 4716 Media History Credit Hours: (3)
- JRSM 4720 Presidents and the Press Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours):

- JRSM 4930 Media Internship \*\* Credit Hours: (3)
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)

# Public Relations Major Core (12 hours):

- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

# Additional Core Requirements (18 hours):

- PBRL 4410 Public Relations Research Credit Hours: (3)
- PBRL 4440 Public Relations Campaigns \*\* Credit Hours: (3) Two of the following: (6 hours)

- PBRL 3409 Public Relations Case Studies Credit Hours: (3)
- PBRL 3431 Advanced PR Writing Credit Hours: (3)
- PBRL 4301 Event Planning for PR Credit Hours: (3)
- PBRL 4421 Crisis Comm in Public Relation Credit Hours: (3)
- PBRL 4430 Media Relations Credit Hours: (3)
- PBRL 4431 Music Promo/Public Relations Credit Hours: (3) Two of the following: (6 hours)
- ADVR 3300 Intro to Advertising \*\* Credit Hours: (3)
- ADVR 3310 Branding and Strategic Media Credit Hours: (3)
- ADVR 3320 Strategic Account Management Credit Hours: (3)
- ADVR 3330 Analytics & Evaluation Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- CRMM 4920 Information Design Credit Hours: (3)
- PBRL 3441 Writing for Social Media Credit Hours: (3)
- PBRL 4450 Social Media Tactics/Analytics Credit Hours: (3)

# Business courses (9 hours):

Required Fogelman College of Business & Economics courses:

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)

### Electives

Completion of courses to bring the total to 120 semester hours.

### Typical 4-Year Public Relations Sequence

#### Freshman Year

- JRSM 1700 Intro to Media \*\* Credit Hours: (3) \*\*
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences (3) \*
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Humanities/Fine Arts (3) \*
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)

Semester Totals 30 hrs

#### Sophomore Year

- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- Non-JRSM elective (Minor) (3)
- Foreign Language/B.A. (3)
- History (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*

- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)
- Natural Science\* (4)
- Foreign Language/BA (3)
- Fine Arts\* (3)
- Math\* (3)

### Semester Totals 31 hrs

### Junior Year

- JOUR 3120 Reporting Credit Hours: (3) or JOUR 3130 Feature Writing/Reporting \*\* or JOUR 3526 Multimedia Storytelling
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Non-JRSM Elective (Minor) (3)

• PBRL 4301 - Event Planning for PR Credit Hours: (3) or PBRL 4421 - Crisis Comm in Public Relation or PBRL 4430 - Media Relations or PBRL 4431 - Music Promo/Public Relations

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (3)

### Semester Totals 31 hrs

### Senior Year

- PBRL 4410 Public Relations Research Credit Hours: (3)
- ADVR/JOUR/JRSM/PBRL Elective (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)
- Non-JRSM Elective (Minor) (3)
- Non-JRSM Elective (Minor) (1)
- JRSM 4930 Media Internship \*\* Credit Hours: (3) or
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)
- PBRL 4440 Public Relations Campaigns \*\* Credit Hours: (3)
- UD JRSM Elective (3)
- ADVR 3300 Intro to Advertising \*\* Credit Hours: (3) or
- ADVR 3310 Branding and Strategic Media Credit Hours: (3) or
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3) or
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- Non-JOUR Elective (Minor) (3)

### Semester Totals 28 hrs

# Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*\*Unless Fine Arts was taken in General Education humanities/Fine Arts, take Non-JOUR Elective (Minor)

# **Public Relations - Strategic Social Media Concentration, (B.A.)**

The Bachelor of Arts in Public Relations, concentration in Strategic Social Media, equips students with the practical skills and critical knowledge that they need to use social media to deepen impact in any industry, including strategy development, digital analytics, paid and organic social campaigns, and audience research. Strategic Social Media concentration graduates typically work as social media managers, entrepreneurs, or as public relations professionals in government, corporate, nonprofit or agency settings.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# Journalism and Strategic Media Core (18 hours)

- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours):

- JRSM 4702 Media, Diversity & Society \*\* Credit Hours: (3)
- JRSM 4704 Issues in Sport and Media Credit Hours: (3)
- JRSM 4708 Media Ethics Credit Hours: (3)
- JRSM 4716 Media History Credit Hours: (3)
- JRSM 4720 Presidents and the Press Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

#### Internship or Practicum

Select one of the following (3 hours):

- JRSM 4930 Media Internship \*\* Credit Hours: (3)
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)

### Public Relations Major Core (12 hours):

- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)

### Strategic Social Media Concentration (18 hours)

- ADVR 3324 Creative Strategy Credit Hours: (3)
- ADVR 3330 Analytics & Evaluation Credit Hours: (3)
- PBRL 3441 Writing for Social Media Credit Hours: (3)
- PBRL 4450 Social Media Tactics/Analytics Credit Hours: (3)
- ADVR/CRMM/JOUR/JRSM/PBRL Electives Credit Hours: (6)

# Business courses (9 hours)

Required Fogelman College of Business & Economics courses:

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)

# Electives

Completion of courses to bring the total to 120 semester hours.

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Typical 4-Year Public Relations – Strategic Social Media Concentration Sequence

### **Freshman Year**

#### First Semester:

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- JRSM 1700 Intro to Media \*\* Credit Hours: (3) \*\*
- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- Foreign Language/B.A. Credit Hours: (3)
- Social/Behavioral Sciences Credit Hours: (3) \*

#### Second Semester:

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- Foreign Language/B.A. Credit Hours: (3)
- Humanities/Fine Arts Credit Hours: (3) \*

#### Semester Totals 30 hrs

### Sophomore Year

#### **First Semester:**

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- Non-JRSM elective (Minor) Credit Hours: (3)
- Foreign Language/B.A. Credit Hours: (3)
- History Credit Hours: (3) \*

#### Second Semester:

377

- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3)
- Natural Science\* **Credit Hours:** (4)
- Foreign Language/BA Credit Hours: (3)
- Math\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)

Semester Totals 31 hrs

#### Junior Year

#### First Semester:

- JOUR 3526 Multimedia Storytelling Credit Hours: (3)
- PBRL 3441 Writing for Social Media Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- Fine Arts\* Credit Hours: (3)
- Natural Science Credit Hours: (4) \*

#### Second Semester:

- ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- History Credit Hours: (3)\*
- Non-JRSM Elective (Minor) Credit Hours: (3)
- Non-JRSM Elective (Minor) Credit Hours: (3)

#### Semester Totals 31 hrs

#### Senior Year

#### **First Semester:**

- ADVR 3324 Creative Strategy Credit Hours: (3)
- ADVR 3330 Analytics & Evaluation Credit Hours: (3)
- JRSM 4700 Media Law \*\* Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3)

#### Second Semester:

- PBRL 4450 Social Media Tactics/Analytics Credit Hours: (3)
- JRSM Values Elective (JRSM 4702/4704/4708/4716/4720/4910) Credit Hours: (3)
- JRSM 4930 Media Internship \*\* Credit Hours: (3) or
- JRSM 4940 Student Media Practicum Credit Hours: (1-3)
- Non-JOUR Elective (Minor) Credit Hours: (3)

#### Semester Totals 28 hours

### Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# Social Work, (B.A.)

The B.A. program in Social Work is designed to equip students with the knowledge and skills necessary for entrance into the profession of social work as beginning level generalist practitioners. Program objectives for a B.A. in Social Work are: a) apply critical thinking skills within the context of professional social work practice; (b) understand the value base of the profession and its ethical standards and principles, and practice accordingly; (c) practice without discrimination to needs of diverse clientele; (d) apply strategies of advocacy and social change that advance social and economic justice. Many social work courses have service-learning requirements and an internship is required.

# Admission:

Progression to the major of "Social Work" will occur only after the student successfully completes the following course with a minimum grade of "C-":

- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2011 Writing for Social Work Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Students majoring in Social Work must take SOCI 3422 to fulfill part of the University General Education History requirement and ANTH 1200 for Social/Behavioral Sciences.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

### Note:

Successful student progression requires each student to earn a minimum grade of "C" in all required courses for social work majors. Students repeating two required classroom courses for the major or field instruction will have an academic review by department faculty in the term following the second course repetition. Students should have a minimum of 30 hours completed before entering the introductory social work courses including:

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3) Two courses from:
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- POLS 1030 American Government\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)

# The Major (39 hours in addition to University General Education Program requirements)

#### Completion of

- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2011 Writing for Social Work Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)
- SWRK 3903 Social Work Practice | Credit Hours: (4)
- SWRK 3904 Social Work Practice II Credit Hours: (3)
- SWRK 3906 Social Work Practice III Credit Hours: (3)
- SWRK 3920 Soc Welfare Policy/Programs Credit Hours: (3)
- SWRK 3930 Intro Soc Work Research Credit Hours: (3)
- SWRK 4830 Field Instruction Soc Work | Credit Hours: (3)
- SWRK 4831 Field Instruction Soc Work II Credit Hours: (4)
- SWRK 4840 Integrative Field Seminar I Credit Hours: (2)
- SWRK 4841 Integrative Field Seminar II Credit Hours: (2)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3) (included in the University General Education Program requirements)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3) and
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

# Electives

Electives may be chosen to bring the total number of hours to 120.

# Typical 4-Year Social Work Sequence

### Freshman Year

#### First Semester

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Elective (3)

#### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- Humanities (3) \*
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences (3) \*

#### Semester Totals 30-31 hrs

#### Sophomore Year

#### **First Semester**

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
  - 0
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science (4)
- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2011 Writing for Social Work Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

#### Second Semester

• History (3)\*

- Fine Arts (3)\*
- Natural Science (4)
- SWRK 3920 Soc Welfare Policy/Programs Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

#### First Semester

- SWRK 3903 Social Work Practice | Credit Hours: (4)
- SWRK 3930 Intro Soc Work Research Credit Hours: (3)
- Social Science\* (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)

#### Second Semester

- Elective (3)
- SWRK 3904 Social Work Practice II Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- SWRK 3906 Social Work Practice III Credit Hours: (3)
- UD Elective (3)

#### Semester Totals 31 hrs

### Senior Year

- SWRK 4830 Field Instruction Soc Work | Credit Hours: (3)
- SWRK 4840 Integrative Field Seminar I Credit Hours: (2)
- Elective (3)
- Elective (4)
- SWRK 4841 Integrative Field Seminar II Credit Hours: (2)
- UD elective (3)
- SWRK 4831 Field Instruction Soc Work II Credit Hours: (4)
- Elective (3)
- Elective (3)

Semester Totals 27 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

For the General Education Social/Behavioral Science and Additional Social Science - Complete 2 of the following: SOCI 1010, POLS 1030 and ECON 2020.

# Sociology Honors, (B.A.)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research

projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in sociology,

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- SOCI 4210 Rise of Sociological Theory Credit Hours: (3) or
- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3) or
- SOCI 4998 Honors Thesis Credit Hours: (3) (for Honors students) or
- SOCI 4995 Senior Capstone Seminar\*\* Credit Hours: (3)
- Plus 15 additional upper-division hours in SOCI.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Honors Program in Sociology requires 18 hours of honors work, at least 12 hours of which must be upper-division sociology courses. To complete the Honors Program, a student must have a minimum overall final grade point average of 3.00 in Sociology, and a 3.25 grade point average in honors course work.

Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Sociology." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Please see the department's Faculty Honors Advisor for more details on the program.

# Typical 4-Year Sociology Sequence

# **Freshman Year**

#### First Semester

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3)
- Foreign Language/B.A. (3)

• Elective (3)

#### Semester Total: 15 hrs

#### Second Semester

- Humanities\* (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences\* (3) Semester Total: 15 hrs

#### Semester Totals 30 hrs

### Sophomore Year

#### **First Semester**

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
  - or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History\* (3)
- Elective (3)
- Natural Science\* (4)
- Elective (3)

# Semester Total: 16 hrs

#### Second Semester

- UD SOCI (3)
- Fine Arts\* (3)
- History\* (3)
- Natural Science\* (4)
- Elective (3)

Semester Total: 16 hrs

### Semester Totals 32 hrs

#### Junior Year

#### First Semester

- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- UD SOCI (3)
- Elective (3)
- UD elective (3)
- Elective (3)

#### Semester Total: 15 hrs

#### Second Semester

- SOCI 4210 Rise of Sociological Theory Credit Hours: (3) or
- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- UD SOCI (3)
- UD SOCI (3)
- UD elective (3)
- Elective (3)
  - Semester Total: 15 hrs

# Senior Year

#### First Semester

- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- UD Elective (3)
- UD SOCI (3)
- UD elective (3)
- Elective (3)
  - Semester Total: 15 hrs

#### Second Semester

- SOCI 4995 Senior Capstone Seminar\*\* Credit Hours: (3) or
- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3)
- UD elective (3)
- Elective (3)
- Elective (4)

Semester Total: 13 hrs

Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Sociology, (B.A.)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in sociology,

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- SOCI 4210 Rise of Sociological Theory Credit Hours: (3)
- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3) or
- SOCI 4998 Honors Thesis Credit Hours: (3) (for Honors students) or
- SOCI 4995 Senior Capstone Seminar\*\* Credit Hours: (3)
- Plus 15 additional upper-division hours in SOCI.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Typical 4-Year Sociology Sequence

### **Freshman Year**

#### **First Semester**

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3)
- Foreign Language/B.A. (3)
- Elective (3)

Semester Total: 15 hrs

#### Second Semester

- Humanities\* (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- Social/Behavioral Sciences\* (3) Semester Total: 15 hrs

Semester Totals 30 hrs

#### Sophomore Year

#### First Semester

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- History\* (3)
- Elective (3)
- Natural Science\* (4)
- Elective (3)

### Semester Total: 16 hrs

### Second Semester

- UD SOCI (3)
- Fine Arts\* (3)
- History\* (3)

- Natural Science\* (4)
- Elective (3)

Semester Total: 16 hrs

#### Semester Totals 32 hrs

### Junior Year

#### First Semester

- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- UD SOCI (3)
- Elective (3)
- UD elective (3)
- Elective (3)
  - Semester Total: 15 hrs

#### Second Semester

- SOCI 4210 Rise of Sociological Theory Credit Hours: (3) or
- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- UD SOCI (3)
- UD SOCI (3)
- UD elective (3)
- Elective (3)

Semester Total: 15 hrs

#### Semester Totals 30 hrs

### Senior Year

#### **First Semester**

- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- UD Elective (3)
- UD SOCI (3)
- UD elective (3)
- Elective (3)

Semester Total: 15 hrs

#### Second Semester

- SOCI 4995 Senior Capstone Seminar\*\* Credit Hours: (3) or
- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3)
- UD elective (3)
- Elective (3)
- Elective (4)

Semester Total: 13 hrs

Semester Totals 28 hrs

### Total Hours: 120-121

Total Hours Required for Graduation: 120

\*\*Courses offered only online or both online and on-ground

# Sport & Leisure Management (B.S.)

The program objectives of the B.S. in Sport and Leisure Management (SLM) are: (a) to become involved in the profession and committed to the academic, service, and social mission of the profession; (b) to demonstrate an awareness of the critical role of diversity to the delivery of inclusive sport and leisure services; (c) to demonstrate effective leadership within the sport and leisure profession; and (d) to behave in accordance with the ethical standards of the sport and leisure profession.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. The following are recommended or required for the major: Social/Behavioral Sciences: ECON (TNe) 2010 is required.

# The Major (79 hours)

Core Requirements (31 hours)

- SLS 2105 Foundation/Sport/Leisure Mgt \*\* Credit Hours: (4)
- SLS 3104 Commercial Rec and Tourism \*\* Credit Hours: (3)
- SLS 3105 Sport/Leisure as Pop Culture \*\* Credit Hours: (3)
- SLS 3204 Org Analysis Sport/Leisure \*\* Credit Hours: (3)
- SLS 3605 Financial Management SLS \*\* Credit Hours: (3)
- SLS 3650 Promotions in Sport & Leisure \*\* Credit Hours: (3)
- SLS 4135 Sport/Culture Global Perspect \*\* Credit Hours: (3)
- SLS 4155 Sport/Leisure Governance \*\* Credit Hours: (3)
- SLS 4205 Legal Aspects SLM \*\* Credit Hours: (3)
- SLS 4500 Sport/Leisure Mktg \*\* Credit Hours: (3) SLS Electives (27-48 hours)

Includes all SLS/SLC courses not required in the major core and:

- HPRM 2007 Resort Management Credit Hours: (1)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 2999 Purchase/Hospitality Industry Credit Hours: (1)
- HPRM 3130 Hospitality Law Ethics & Risk Credit Hours: (3)
- HPRM 3600 Entertainment Management Credit Hours: (3)

# General Electives (0-21 hours) to bring the total hours to 120.

# Accelerated B.S. in Sport and Leisure Management/M.S in Sport Commerce

The Accelerated Bachelor's/Master's (ABM) degree program is a B.S. in Sport and Leisure Management/M.S in Sport Commerce. This program allows outstanding undergraduate students to begin the coursework for the M.S. in Sport Commerce during their senior year. Students are encouraged to begin planning to enter the ABM program early in their undergraduate career in consultation with their advisor. Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study that will allow them to complete their B.S. in Sport and Leisure Management degree while also beginning coursework toward their M.S. in Sport Commerce degree.

To apply, students must have a minimum 3.25 grade point average, submit two letters of reference, and provide a copy of their academic transcript to the Kemmons Wilson School of Hospitality and Resort Management. Each applicant will complete an interview with the graduate academic coordinator of the M.S. in Sport Commerce program. To continue in the program past the B.S. in Sport and Leisure Management, students must apply for full admission to both the Graduate School and the M.S. in Sport Commerce program. In the ABM program, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to a student's undergraduate grade point average.

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3) Social/Behavioral Sciences\* Mathematics\* Humanities/Fine Arts\* General Elective
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) Natural Science/Lab\* Humanities/Fine Arts\* History\*

### Semester Totals : 31 hours

### Sophomore Year

Natural Science/Lab\* Literature

- SLS 2105 Foundation/Sport/Leisure Mgt \*\* Credit Hours: (4) SLS Elective
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3) History\*
- SLS 3204 Org Analysis Sport/Leisure \*\* Credit Hours: (3)
- SLS 3605 Financial Management SLS \*\* Credit Hours: (3) SLS Elective

#### Semester Totals: 29 hours

### Junior Year

- SLS 3104 Commercial Rec and Tourism \*\* Credit Hours: (3)
- SLS 3105 Sport/Leisure as Pop Culture \*\* Credit Hours: (3)
- SLS 4500 Sport/Leisure Mktg \*\* Credit Hours: (3)
  - SLS Elective
  - SLS Elective or General Elective
- SLS 3650 Promotions in Sport & Leisure \*\* Credit Hours: (3)
- SLS 4135 Sport/Culture Global Perspect \*\* Credit Hours: (3)
- SLS 4205 Legal Aspects SLM \*\* Credit Hours: (3) SLS Elective
  - SLS Elective or General Elective

#### Semester Totals: 30 hours

#### Senior Year

- SLS 4155 Sport/Leisure Governance \*\* Credit Hours: (3)
  - SLS Elective SLS Elective or General Elective SLS Elective or General Elective SLS Elective or General Elective SLS Elective

### Semester Totals: 30 hours

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Supply Chain Management, (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3) Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)

- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

# A minimum of 24 upper division semester hours in supply chain management courses as follows:

- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3) and either
- SCMS 4810 Problems in Supply Chain Management Credit Hours: (1-6) or
- SCMS 4811 Internship in Supply Chain Management Credit Hours: (1-6)

The remaining six to nine semester hours chosen by the student from the following courses:

- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)
- SCMS 4512 Current Topics in Supply Chain Management Credit Hours: (3)
- SCMS 4810 Problems in Supply Chain Management Credit Hours: (1-6)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Supply Chain Management Sequence:

# **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- History (3) \*
- Humanities/Fine Arts (3) \*
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)

- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- Humanities/Fine Arts (3) \*
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

Elective (3)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- Natural Science (4) \*

or

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- Major elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- Elective (3)

#### Semester Totals 30 hrs

#### Senior Year

- SCMS 4650 Supply Management Credit Hours: (3)
- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- Major elective (3)
- SCMS 4810 Problems in Supply Chain Management Credit Hours: (1-6)

or

- SCMS 4811 Internship in Supply Chain Management Credit Hours: (1-6)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- Major elective (if needed) (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 28-30 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Teaching All Learners (leading to Elementary K-5 and Special Education Interventionist K-8 and 6-12 licensure), (B.S.Ed.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

The following University General Education Program requirements are specified by the department for this major:

### Humanities/Fine Arts:

Choose one of these:

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

Plus one of these:

- ART 1030 Intro to Art\*\* Credit Hours: (3) or
- MUS 1030 Introduction to Music\*\* Credit Hours: (3)
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)

### **Recommended Humanities**

Select one of these recommended Humanities:

- CLAS 2481 Mythology \*\* Credit Hours: (3)
- PHIL 1101 Intro to Philosophy Credit Hours: (3)
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)

### Social/Behavioral Sciences:

• POLS 1030 - American Government\*\* Credit Hours: (3)

### **Choose Either**

- ESCI 1301 Survey of World Regions Credit Hours: (3)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)

### History:

### **Choose Either**

or

- HIST 2010 U S to 1877 Credit Hours: (3)
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3)
- HIST 2030 Tennessee History\*\* Credit Hours: (3)

# **Choose Either**

- HIST 1110 World History to 1500\*\* Credit Hours: (3) or
- HIST 1120 World History since 1500\*\* Credit Hours: (3)

### Natural Sciences:

Choose one from list 1 and choose one from list 2

### List 1:

- BIOL 1010 Biology of Cells\*\* Credit Hours: (3) and
- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1) or
- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3) and
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1)

### List 2:

- ESCI 1010 Weather and Climate Credit Hours: (4)
- ESCI 1020 Landforms \*\* Credit Hours: (4)
- ESCI 1040 Physical Geology Credit Hours: (4)
- ESCI 1103 The Human Planet Credit Hours: (4)
- PHYS 1010 Introductory Physics Credit Hours: (3)
- PHYS 1001 Introductory Physics Lab Credit Hours: (1) or
- PHYS 1020 Survey of Astronomy | Credit Hours: (3)
- PHYS 1002 Astronomy Laboratory Credit Hours: (1)

# Related Liberal Studies (8 hours):

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- IDT 3600 Technology in Education Credit Hours: (3)
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)

# Major Core (18 hours):

Major core for Teaching All Learners:

- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- MATH 1480 Math/Elem School Teachers | Credit Hours: (3)
- MATH 1481 Math/Elem School Teachers II Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)

# Professional Education (18 hours):

Teaching All Learners (Elementary (K-6) / Special Education Modified):

- SPED 3803 Classroom/Behavior Management Credit Hours: (3)
- ELED 3242 Teaching/Learning Elem School Credit Hours: (3)
- LITL 4240 Literacy in Grades K-4 Credit Hours: (3) \*
- SPED 3800 Methods I/Instruct/Literacy Credit Hours: (3)
- ELED 3251 Method/Teach Math/Elem Grades Credit Hours: (3)
- ELED 3271 Method/Social Studies/Elem Grd Credit Hours: (3)

# Pre-residency (15 hours)

Elementary/Special Education Modified Licensure:

- LITL 4241 Literacy in Grades 4-8 Credit Hours: (3) \*
- SPED 3802 Ed Assessment/Inclusive Set Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)
- ELED 3261 Method/Teach/Science/Elem Grde Credit Hours: (3)
- SPED 3804 SPED Methods II. Content Area Credit Hours: (3)

### Residency I Semester (14 hours), offered in fall

Elementary/Special Education Modified Licensure:

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- SPED 4020 Language/Comm/Diverse Classrm Credit Hours: (3)
- ICL 4021 Professional/Ethical Practices Credit Hours: (3)
- ICL 4914 Residency | Practicum Credit Hours: (5) \*

# Residency II Semester (12 hours), offered in spring

Elementary/Special Education Modified Licensure:

- ICL 4800 Residency II Prof Seminar Credit Hours: (3) \*
- ICL 4904 Residency II Clinical Credit Hours: (9)

#### Note

\*Requires admission to TEP.

NOTE: Several courses are taken as corequisites. Please refer to the latest degree plan and course descriptions for specifics.

# <sup>395</sup> Typical 4-Year Sequence for Teaching All Learners: Elementary Education (K-6) and Special Education Modified (K-12) Licensure

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3) \*
- ART 1030 Intro to Art\*\* Credit Hours: (3) \* or
- MUS 1030 Introduction to Music\*\* Credit Hours: (3) \* or
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3) \*
- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- HIST 1110 World History to 1500\*\* Credit Hours: (3) or
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3) or
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3) \*
- MATH 1480 Math/Elem School Teachers | Credit Hours: (3) \*
   Humanities
- HIST 2010 U S to 1877 Credit Hours: (3) or
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3) or
- HIST 2030 Tennessee History\*\* Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)

# Semester Totals 30 hrs

# Sophomore Year

- ELED 3242 Teaching/Learning Elem School Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \* or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- IDT 3600 Technology in Education Credit Hours: (3)
- MATH 1481 Math/Elem School Teachers II Credit Hours: (3)
   Natural Science and Lab
- PETE 3604 Teach Phys Ed/Health/K-Middle Credit Hours: (2)
- POLS 1030 American Government\*\* Credit Hours: (3) Natural Science and Lab
- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3) \*

### Semester Totals 31 hrs

### Junior Year

- LITL 4240 Literacy in Grades K-4 Credit Hours: (3)
- ELED 3251 Method/Teach Math/Elem Grades Credit Hours: (3)
- ELED 3271 Method/Social Studies/Elem Grd Credit Hours: (3)

- SPED 3803 Classroom/Behavior Management Credit Hours: (3)
- SPED 3800 Methods I/Instruct/Literacy Credit Hours: (3)
- ICL 4001 Teaching/Diverse Environment Credit Hours: (3)
- LITL 4241 Literacy in Grades 4-8 Credit Hours: (3)
- SPED 3802 Ed Assessment/Inclusive Set Credit Hours: (3)
- SPED 3804 SPED Methods II. Content Area Credit Hours: (3)
- ELED 3261 Method/Teach/Science/Elem Grde Credit Hours: (3)
- ENGL 4531 Methods and Techniques ESL \*\* Credit Hours: (3)

Semester Totals 33 hrs

Senior Year (Residency Year)

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ICL 4021 Professional/Ethical Practices Credit Hours: (3)
- ICL 4914 Residency | Practicum Credit Hours: (5)
- SPED 4020 Language/Comm/Diverse Classrm Credit Hours: (3)
- ICL 4904 Residency II Clinical Credit Hours: (9)
- ICL 4800 Residency II Prof Seminar Credit Hours: (3)

Semester Totals 26 hrs

### Total Hours Required for Graduation: 120

\*Must satisfy General Education Program Requirements

# **Theatre - Dance Concentration, (B.F.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

# The Major (79 hours)

### Major Core (12 hours)

Choose two (2) design/tech courses from the following:

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills

Required Courses (6 hours)

- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)

Note

397 While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

## Concentration (67 hours)

## Dance (50 hours)

- THEA 3601-THEA 3609 (2) Theatre labs.
- DANC 2101 Dance Improvisation Credit Hours: (3)
- DANC 2825 Intermediate Ballet Credit Hours: (3) (12)
- DANC 3101 History of Dance Credit Hours: (3)
- DANC 3201 Dance Movement Analysis Credit Hours: (3)
- DANC 3829 Advanced Contemporary Dance Credit Hours: (3) (12)
- DANC 4101 Dance Repertory Credit Hours: (3)
- DANC 4201 Dance Composition | Credit Hours: (3)
- DANC 4202 Dance Composition II Credit Hours: (3)
- DANC 4402 Dance Ed/Diverse Settng Credit Hours: (3)
- DANC 4404 Dance Teaching Methods Credit Hours: (3)

#### Dance and Theatre Electives (12 hours)

Dance and Theatre electives are DANC and THEA classes (12 hours).

### Free Electives (5 hours)

The free electives can be non-departmental courses as well as Dance and Theatre courses. Courses should be approved by the student's advisor.

## Typical 4-Year Dance Concentration Sequence

## **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Social Science (3) \*
- DANC 1151 Introduction to Dance Credit Hours: (3)
- DANC Elective (3)

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

- THEA 3601-THEA 3609 (1)
- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 3601-THEA 3609
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social Science (3) \*
- DANC Elective (3)
- MUS 1030 Introduction to Music\*\* Credit Hours: (3)

Semester Totals 32 hrs

Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- DANC 2101 Dance Improvisation Credit Hours: (3)
- DANC 4201 Dance Composition | Credit Hours: (3)
- Dance Elective
- Dance Elective
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- History (3) \*
- Math (3) \*
- THEA 2511 Intro Theatre Production Credit Hours: (3), THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
- DANC 4202 Dance Composition II Credit Hours: (3)

#### Semester Totals 30 hrs

#### Junior Year

- DANC 2825 Intermediate Ballet Credit Hours: (3)
- DANC 3101 History of Dance Credit Hours: (3)
- DANC 3829 Advanced Contemporary Dance Credit Hours: (3)
- DANC 4101 Dance Repertory Credit Hours: (3)
- DANC Elective
- DANC 4402 Dance Ed/Diverse Settng Credit Hours: (3)
- Natural Science (4)\*
- DANC 2825 Intermediate Ballet
- DANC 3829 Advanced Contemporary Dance

#### Semester Totals 28 hrs

#### Senior Year

- History (3) \*
- DANC 2825 Intermediate Ballet Credit Hours: (3)
- DANC 3201 Dance Movement Analysis Credit Hours: (3)
- DANC 3829 Advanced Contemporary Dance Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)
- DANC 4404 Dance Teaching Methods Credit Hours: (3)
- Natural Science (4) \*
- Elective (2)
- DANC 2825 Intermediate Ballet
- DANC 3829 Advanced Contemporary Dance

Semester Totals 30 hrs

#### Total Hours: 120

## Total Hours required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Theatre - Dance Science Concentration, (B.F.A)**

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

## The Major (79 hours)

## Major Core (12 hours)

Choose two (2) Design/Tech courses from the following:

- THEA 2511 Intro Theatre Production Credit Hours: (3)
- THEA 3511 Stagecraft Credit Hours: (3)
- THEA 3515 Costume Construction Credit Hours: (3)
- THEA 3561 Principles Scene Design Credit Hours: (3)
- THEA 3562 Principles Costume Dsgn Credit Hours: (3)
- THEA 3563 Principles of Light & Sound Design Credit Hours: (3)
- THEA 3620 Stage Management Skills Credit Hours: (3)

6 semester hours required from:

- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3) or ESMS 4605 Internship

#### Note:

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in

## Concentration (67 hours)

## Dance Science (36 hours)

• DANC 1000 - Introduction to Dance Science Credit Hours: (3)

Ballet (9 hours)

 DANC 1825 - Beginning Ballet Credit Hours: (3) or DANC 2825 - Intermediate Ballet or DANC 3825 - Advanced Ballet

Contemporary Dance (9 hours)

- DANC 1821 Beginning Contemporary Dance Credit Hours: (3) or DANC 2821 - Intermediate Contemporary Dance or DANC 3829 - Advanced Contemporary Dance
- DANC 3201 Dance Movement Analysis Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- ESMS 3020 Exercise and Sport Mechanics Credit Hours: (3)
- ESMS 3050 Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)

## Dance (12 Upper Division hours)

- DANC 3101 History of Dance Credit Hours: (3)
- DANC 4202 Dance Composition II Credit Hours: (3)
- DANC 4402 Dance Ed/Diverse Settng Credit Hours: (3)
- DANC 4404 Dance Teaching Methods Credit Hours: (3)

### Exercise Movement (9 Upper Division hours)

- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- ESMS 3853 Motor Behavior Credit Hours: (3)
- ESMS 4000 Exercise Testing Interpretation Lab Credit Hours: (3)

## Remaining Courses (10 hours)

The remaining courses can be non-departmental courses as well as Theatre and Dance courses. Courses should be approved by the student's advisor.

## Typical 4-Year Dance Science Concentration Sequence

## **Freshmen Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- DANC 1151 Introduction to Dance Credit Hours: (3)
- DANC 1000 Introduction to Dance Science Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- THEA 3412 Directing Experiments Credit Hours: (3)
- Dance (Ballet) (3)
- Elective (3)

#### Semester Totals 32 hours

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
  - or ENGL 2202 Lit Heritage: African-American \*\*
- History (3)\*
- ESMS 3020 Exercise and Sport Mechanics Credit Hours: (3)
- ESMS 3050 Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
- Dance (Ballet) (3)
- Math (3) \*
- History (3)\*
- THEA 2511 Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
- Dance (Jazz) (3)
- Dance (Contemporary)

#### Semester Totals 30 hours

### Junior Year

- ESMS 3405 Introduction to Structural and Functional Kinesiology Credit Hours: (3)
- ESMS 3700 Exercise Physiology Introduction Credit Hours: (3)
- DANC 3101 History of Dance Credit Hours: (3)
- DANC 3201 Dance Movement Analysis Credit Hours: (3)
- DANC 4201 Dance Composition | Credit Hours: (3)
- Humanities Gen Ed
- Social Science (3)\*
- ESMS 3853 Motor Behavior Credit Hours: (3)
- DANC 4404 Dance Teaching Methods Credit Hours: (3)
- Elective (3)

#### Semester Totals 30 hours

### Senior Year

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- THEA 2511 Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562 THEA 3563 or THEA 3620
- ESMS 4000 Exercise Testing Interpretation Lab Credit Hours: (3)
- ESMS 4605 Internship Credit Hours: (3-6)
- Dance (Contemporary)
- Social Science (3)\*
- Dance (Ballet) (3)
- DANC 4402 Dance Ed/Diverse Settng Credit Hours: (3)
- Elective (3)
- Elective (1)

Semester Totals 28 hours

Total Hours: 120

Total Hours required for Graduation: 120

## **Theatre - Design and Technical Production Concentration, (B.F.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

## The Major (79 hours)

## Major Core (12 hours)

Choose two (2) design/tech courses from the following:

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills

Required Courses (6 hours)

- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)

#### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

## Concentration (67 hours)

## Design and Technical Production (32 hours)

Choose three (3) additional design/tech courses from the following:

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563, or THEA 3620

• THEA 2512 - Intro Theatre Graphics Credit Hours: (2)

• THEA 3601 - Mgmt/Publicity Prod Lab Credit Hours: (1) THEA 3602 - Costumes Production Lab, THEA 3603 - Lighting and Sound Production Lab, THEA 3605 - Scenery Production Lab, THEA 3606 - Props Production Lab, THEA 3608 - Dance Production Lab, THEA 3609 - Stage Management Lab

- THEA 4554 Visual History | Credit Hours: (3)
- THEA 4539 Contemporary Theatre History Credit Hours: (3)
- THEA 4558 Visual History II Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)
- THEA 4591 Professional Theatre Practice Credit Hours: (3)

#### Technology Courses (10 hours)

Choose 10 hours from the following technical courses. Each course is two (2) credits each except THEA 3620 which is three (3) credits:

- THEA 2514 Theatre Drafting Credit Hours: (2)
- THEA 3620 Stage Management Skills Credit Hours: (3)
- THEA 3621 Introduction to Prop Craft Credit Hours: (2)
- THEA 4511 Automation & Mechanization Credit Hours: (2)
- THEA 4513 Digital Fabrication Credit Hours: (2)
- THEA 4516 Technical Direction Credit Hours: (3)
- THEA 4555 Scenic Technology Credit Hours: (3)
- THEA 4556 Light & Sound Tech Credit Hours: (3)
- THEA 4557 Costume Technology | Credit Hours: (2)
- THEA 4573 Costume Technology II Credit Hours: (2)

#### Design courses (16 hours)

Choose 16 hours from the following design courses. Each course is two (2) credits each:

- THEA 4512 Digital Rendering Credit Hours: (2)
- THEA 4514 Theatre Rendering Techniques Credit Hours: (3)
- THEA 4515 Scene Painting Credit Hours: (3)
- THEA 4517 Scene Painting II Credit Hours: (2)
- THEA 4561 Scenic Design | Credit Hours: (2)

- THEA 4562 Lighting Design | Credit Hours: (2)
- THEA 4563 Costume Design | Credit Hours: (2)
- THEA 4565 Costume Design II Credit Hours: (2)
- THEA 4568 Sound Design II Credit Hours: (2)
- THEA 4575 Scenic Design II Credit Hours: (2)
- THEA 4577 Lighting Design II Credit Hours: (2)
- THEA 4596 Sound Design I Credit Hours: (2)

#### Remaining Hours (7 hours)

Remaining hours (7) are Design and Technical courses, other department courses, or non-department electives approved by the student's advisor.

## Typical 4-Year Design and Technical Production Concentration Sequence

### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- History (3) \*
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)
- THEA 3601-THEA 3609

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

- THEA 2514 Theatre Drafting Credit Hours: (2) (TECH)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Math (3) \*
- THEA 2512 Intro Theatre Graphics Credit Hours: (2)
- THEA 3601-THEA 3609 (1)
- THEA 3412 Directing Experiments Credit Hours: (3)

• THEA 2511 - Intro Theatre Production, THEA 3511 - Stagecraft Credit Hours: (3) THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

#### Semester Totals 30 hrs

#### Sophomore Year

- Social/Behavioral Sciences (3) \*
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Design Course (2)
- Tech Course (2)
- THEA 3601-THEA 3609 (1)
- THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
- THEA 4582 Script Interpretation Credit Hours: (3)
- Design Course (2)
- Design Course (2)
- THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
- Tech Course (2)
- THEA 3601-THEA 3609 (1)
- Elective

403

## Junior Year

- Design Course (2)
- Tech Course (2)
- THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
- THEA 4554 Visual History I Credit Hours: (3)
- Natural Science (4)\*
- THEA 3601-THEA 3609 (1)
- THEA 4558 Visual History II Credit Hours: (3)
- Design Course (2)
- Tech Course (2)
- Elective (3)
- Social Science (3)\*

#### Semester Totals 28 hrs

#### Senior Year

- Natural Science (4)\*
- THEA 4541 Internship Credit Hours: (1-3)
- Design Course (2)
- Design Course (2)
- THEA 3601-THEA 3609 (1)
- THEA 4549 Theatre History Credit Hours: (3)
- THEA 4539 Contemporary Theatre History Credit Hours: (3)
- THEA 4591 Professional Theatre Practice Credit Hours: (3)
- History (3)\*
- Design Course (2)
- Elective (4)

Semester Totals 29 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Theatre - Musical Theatre Concentration, (B.F.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

## The Major (79 hours)

## Major Core (12 hours)

Choose two (2) design/tech courses from the following:

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills

Required Courses (6 hours)

- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)

#### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

## Concentration (67 hours)

### **Musical Theatre**

- THEA 2501 Stage Movement Credit Hours: (3)
- THEA 2503 Basic Keyboard Skills/Actors Credit Hours: (1)
- THEA 2505 Functional Keyboarding skills for Actors Credit Hours: (1)
- THEA 2532 Acting | Credit Hours: (3)
- THEA 3200 (6)
- THEA 3212 Vocal Prod & Articulation | Credit Hours: (3)
- THEA 3213 Vocal Prod & Articulation II Credit Hours: (3)
- THEA 3531 Acting II Credit Hours: (3)
- THEA 3551 Audition Prep Performance Credit Hours: (3)
- THEA 3601-THEA 3609 (1)
- THEA 4220 Acting through Song | Credit Hours: (3)
- THEA 4223 Acting through Song II Credit Hours: (3)
- THEA 4224 Principle/Music Theory/Theatre Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)
- THEA 4591 Professional Theatre Practice Credit Hours: (3)

#### Dance Electives (12 hours)

Dance electives for 12 hours.

#### Remaining Hours (9 hours)

Remaining hours (9) are Musical Theatre courses, other department courses, or non-department electives approved by the student's advisor.

## Typical 4-Year Musical Theatre Concentration Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)

• THEA 2511 - Intro Theatre Production Credit Hours: (3) or THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

- THEA 2501 Stage Movement Credit Hours: (3)
- THEA 2503 Basic Keyboard Skills/Actors Credit Hours: (1)
- THEA 4224 Principle/Music Theory/Theatre Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- MATH (3) \*
- History (3) \*
- THEA 2505 Functional Keyboarding skills for Actors Credit Hours: (1)
- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 3601-THEA 3609 (1)

#### Semester Totals 33 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*
- THEA 3212 Vocal Prod & Articulation | Credit Hours: (3)
- DANC (Ballet) (3)
- THEA 3200 Musical Theatre Applied Voice Credit Hours: (1-2)
- THEA 2532 Acting | Credit Hours: (3)
- THEA 3601-THEA 3609 (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- History (3) \*
- THEA 3200 Musical Theatre Applied Voice (1)
- DANC (Ballet) (3)
- THEA 3213 Vocal Prod & Articulation || Credit Hours: (3)
- THEA 3531 Acting II Credit Hours: (3)

#### Semester Totals 30 hrs

#### Junior Year

- THEA 3200 Musical Theatre Applied Voice Credit Hours: (1-2)
- THEA 3551 Audition Prep Performance Credit Hours: (3)
- DANC 3826 Musical Theatre Dance | Credit Hours: (3)
- Elective (3)
- THEA 3601-THEA 3609
- THEA 4220 Acting through Song | Credit Hours: (3)
- THEA 2511 Intro Theatre Production Credit Hours: (3) or THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 -Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills
- THEA 4223 Acting through Song II Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- THEA 3200 Musical Theatre Applied Voice (1)
- DANC 3827 Musical Theatre Dance II Credit Hours: (3)
- THEA 3601-THEA 3609

## Senior Year

- Natural Science (4) \*
- Elective (3)
- THEA 3200 Musical Theatre Applied Voice Credit Hours: (1-2)
- THEA 4541 Internship Credit Hours: (1-3)
- THEA 4549 Theatre History Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)
- Natural Science (4) \*
- THEA 3200 Musical Theatre Applied Voice
- THEA 4591 Professional Theatre Practice Credit Hours: (3)
- THEA 4548 Musical Theatre History Credit Hours: (3)
- Elective (4)

Semester Totals 30 hrs

Total Hours: 120

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Theatre - Performance Concentration, (B.F.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

## The Major (79 hours)

## Major Core (12 hours)

Choose two (2) design/tech courses from the following:

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills

Required Courses (6 hours)

- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)

## Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine

408 Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

## Concentration (67 hours)

### Performance

- THEA 2501 Stage Movement Credit Hours: (3)
- THEA 2532 Acting | Credit Hours: (3)
- THEA 3212 Vocal Prod & Articulation | Credit Hours: (3)
- THEA 3213 Vocal Prod & Articulation || Credit Hours: (3)
- THEA 3506 Stage Combat Credit Hours: (3)
- THEA 3531 Acting II Credit Hours: (3)
- THEA 3532 Acting III Credit Hours: (3)
- THEA 3551 Audition Prep Performance Credit Hours: (3)
- THEA 3601-THEA 3609 (4)
- THEA 4531 Acting Styles Credit Hours: (3)
- THEA 4457 Vocal Style/Performance Credit Hours: (3)
- THEA 4539 Contemporary Theatre History Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)
- THEA 4591 Professional Theatre Practice Credit Hours: (3)

#### Acting Electives (18 hours)

Choose six acting emphasis electives.

- THEA 2504 Singing for the Actor Credit Hours: (3)
- THEA 2515 Stage Makeup Credit Hours: (2)
- THEA 4220 Acting through Song | Credit Hours: (3)
- THEA 4221 Stage Dialects Credit Hours: (3)
- THEA 4455 Directing Narrative Theatre Credit Hours: (3)
- THEA 4501 Adv Movement Styles Credit Hours: (3)
- THEA 4503 Creative Dramatics Credit Hours: (3)
- THEA 4521 Principles of Stage Direction Credit Hours: (3)
- THEA 4531 Acting Styles Credit Hours: (3)
- THEA 4532 Mask Performance Credit Hours: (3)
- THEA 4548 Musical Theatre History Credit Hours: (3)
- THEA 4545 Thea/African Diaspora Credit Hours: (3)
- THEA 4571 Playwriting Credit Hours: (3)
- THEA 4631 Acting for Film and TV Credit Hours: (3)
- DANC 1821 Beginning Contemporary Dance Credit Hours: (3)
- DANC 1825 Beginning Ballet Credit Hours: (3)
- DANC 1827 Beginning Jazz Credit Hours: (3)
- DANC 1831 Tap Dance | Credit Hours: (3)
- DANC 2821 Intermediate Contemporary Dance Credit Hours: (3)
- DANC 2825 Intermediate Ballet Credit Hours: (3)
- DANC 2827 Intermediate Jazz Credit Hours: (3)

#### Remaining courses (6 hours)

The remaining courses can be non-departmental courses as well as Theatre and Dance courses. Courses should be approved by the student's advisor.

## Typical 4-Year Performance Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- History (3) \*
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)
- THEA 3601-THEA 3609 (1)

• THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

- THEA 2501 Stage Movement Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- THEA 3412 Directing Experiments Credit Hours: (3)
- THEA 3601-THEA 3609 (1)
- Social/Behavioral Sciences (3) \*

#### Semester Totals 33 hrs

### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Lit Heritage: African-American \*\*
- Math (3) \*
- THEA 3212 Vocal Prod & Articulation | Credit Hours: (3)
- THEA 2532 Acting | Credit Hours: (3)
- THEA 3601-THEA 3609 (1)
- Elective
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- THEA 3213 Vocal Prod & Articulation II Credit Hours: (3)
- THEA 3601-THEA 3609 (1)
- THEA 3531 Acting II Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)
- THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620

#### Semester Totals 32 hrs

#### Junior Year

- THEA 3551 Audition Prep Performance Credit Hours: (3)
- Social/Behavioral Sciences (3) \*
- THEA 3532 Acting III Credit Hours: (3)
- THEA 4457 Vocal Style/Performance Credit Hours: (3)
- Elective (3)
- THEA 3506 Stage Combat Credit Hours: (3)
- Elective (3)
- Elective (3)
- THEA 4531 Acting Styles Credit Hours: (3)

#### Semester Totals 27 hrs

#### Senior Year

- Elective (3)
- Natural Science (4)
- Elective (3)
- THEA 4541 Internship Credit Hours: (1-3)
- THEA 4549 Theatre History Credit Hours: (3)
- THEA 4591 Professional Theatre Practice Credit Hours: (3)
- Elective (3)
- Elective (3)
- THEA 4539 Contemporary Theatre History Credit Hours: (3)

Semester Totals 28 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## World Languages and Literatures, (B.A.)

Program objectives for a B.A. in World Languages and Literatures are: (a) have functional control of the appropriate fundamental language skills for the principal language of the major. For modern languages, these include speaking, listening, reading, and writing. For ancient languages, these include reading, reciting in a standard scholarly reconstructed pronunciation, and the ability to analyze grammatical structures in detail; (b) be able to describe and critically evaluate the cultural assumptions and points of view of the targeted culture(s) of their principal language of concentration; (c) Be able to describe and appreciate the interplay of literature, language, history, and culture in the principal language of concentration.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

## The Major (24-33 hours)

Successful completion of one of the following concentrations:

- A single-language concentration in French, Chinese, German, Italian, Japanese, or \*Spanish: 24 upper division semester hours.
- A two-language concentration chosen from Chinese, French, German, Italian, Japanese, Portuguese, Russian, and Spanish: 27 upper division semester hours with a minimum of 9 semester hours in each language.

• A three-language concentration chosen from Chinese, French, German, Italian, Japanese, Portuguese, Russian, and Spanish: All three language concentrations require prior consultation with the approval of the department chair. Plans will normally include at least 33 upper division semester hours to include at least 12 semester hours in each of two languages plus approved course work in a third language.

- \* Students with a single-language concentration in Spanish must take
- SPAN 4410 Spanish Lit and Civilization Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- SPAN 4510 Spanish Amer Lit/Civilization Credit Hours: (3)
- SPAN 4563 Hispanic Literature Genres Credit Hours: (3)

#### Electives

Electives may be chosen to bring the total number of hours to 120.

## Typical 4-Year French Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- Social/Behavioral Science (3) \*
- Elective (3)
- FREN 2010 Intermediate French I Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Social/Behavioral Science (3) \*
- Humanities (3) \*
- FREN 2020 Intermediate French II Credit Hours: (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Elective (3)
- Natural Science (4) \*

or

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- History (3) \*
- Fine Arts (3) \*
- Elective (3)
- UD FREN (3)
- UD Elective (3)
- History (3) \*
- Elective (3)
- UD FREN (3)
- UD Elective (3)
- Elective (3)

#### Semester Totals 30 hrs

### Senior Year

- UD FREN (3)
- UD FREN (3)
- Elective (3)
- UD elective (3)
- UD elective (3)
- UD FREN (3)
- UD elective (3)
- UD elective (3)
- Elective (4)

#### Semester Totals 28 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Spanish Concentration Sequence

## Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH (3-4) \*
- Social/Behavioral Science (3) \*
- SPAN 2010 Intermediate Spanish I\*\* Credit Hours: (3)
- Elective (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Social/Behavioral Science (3) \*
- SPAN 2020 Intermediate Spanish II\*\* Credit Hours: (3)
- Humanities (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Fine Arts (3) \*
- Natural Science (4) \*
- UD SPAN (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)

or

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- UD elective (3)
- Elective (3)
- Natural Science (4) \*
- UD SPAN (3)
- UD SPAN (3)

#### Junior Year

- History (3) \*
- UD SPAN (3)
- Elective (3)
- Elective (3)
- UD elective (3)
- History (3) \*
- Elective (3)
- Elective (3)
- UD Elective (3)
- SPAN 4563 Hispanic Literature Genres Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

- Elective (3)
- SPAN 4410 Spanish Lit and Civilization Credit Hours: (3)
- UD SPAN (3)
- UD elective (3)
- Elective (3)
- SPAN 4510 Spanish Amer Lit/Civilization Credit Hours: (3)
- UD elective (3)
- UD elective (3)
- Elective (4)

Semester Totals 28 hrs

Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Minors

## **Accounting Minor**

## Requirements

For students whose major is in another college of the University (18 hours):

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ACCT 3110 Intermediate Accounting I \*\* Credit Hours: (3)
- ACCT 3120 Intermediate Accounting II \*\* Credit Hours: (3)
- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)

## For students whose major is in a department in The Fogelman College of Business and Economics (12 hours):

- ACCT 3110 Intermediate Accounting I \*\* Credit Hours: (3)
- ACCT 3120 Intermediate Accounting II \*\* Credit Hours: (3)
- ACCT 3310 Cost Accounting \*\* Credit Hours: (3)
- ACCT 3510 Federal Income Tax I \*\* Credit Hours: (3)

## **Advertising Minor**

To complete the minor in Advertising, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

## Advertising Minor Core

- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- ADVR 3300 Intro to Advertising \*\* Credit Hours: (3) Select Three of the Following:
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- ADVR 3310 Branding and Strategic Media Credit Hours: (3)
- ADVR 3320 Strategic Account Management Credit Hours: (3)
- ADVR 3330 Analytics & Evaluation Credit Hours: (3)
- ADVR 3324 Creative Strategy Credit Hours: (3)
- ADVR 4326 Advertising Research Credit Hours: (3)
- ADVR 4327 Media Planning Credit Hours: (3)
- ADVR 4328 Strategic Adv Campaigns Credit Hours: (3)

## **Aerospace Studies Minor**

#### Requirements

Upon successful completion of 16 semester hours in Aerospace Studies with a minimum grade of C, a cadet may apply for a minor in Aerospace Studies.

## **African and African American Studies Minor**

Completion of 18 semester hours including AAAS 2100, AAAS 3100, and 12 hours of electives from the following groups, with at least 3 hours from each group. Students may also choose other courses not on the following list as substitutions with the approval of the African and African American Studies advisor:

## Requirements

Humanities:

- AAAS 4351 Ghanaian Hist/Culture Credit Hours: (3)
- ENGL 3325 Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3)
- ENGL 3326 Af/Am Lit since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4372 Af/Am Author/Harlem Ren \*\* Credit Hours: (3)
- ENGL 4373 Af/Am Author since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4374 Af/Am Lit Movements \*\* Credit Hours: (3)
- ENGL 4521 Language and Society \*\* Credit Hours: (3)
- HIST 3273 Islamic History to 1405 Credit Hours: (3)
- HIST 3281 History/Africa to 1500 Credit Hours: (3)
- HIST 3282 History of Africa since 1500 Credit Hours: (3)
- HIST 3670 Civil War/Reconstruction\*\* Credit Hours: (3)
- HIST 3840 U S Constitutional History Credit Hours: (3)
- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4022 Oral History Credit Hours: (3)
- HIST 4050-4069 Special Topics in History Credit Hours: (1-3)
- HIST 4283 History/South Africa Credit Hours: (3)
- HIST 4288 West Africa/Diaspora \*\* Credit Hours: (3)
- HIST 4289 African Women's History Credit Hours: (3)
- HIST 4853 African American Women Credit Hours: (3)
- HIST 4871 U S Urban History Credit Hours: (3)
- HIST 4879 Africa to the Americas Credit Hours: (3)
- HIST 4880 Slavery/Freedom/Segregation Credit Hours: (3)
- HIST 4882 Civil Rights Movement Credit Hours: (3)
- PHIL 3452 Feminist Theory Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)

#### Social and Behavioral Sciences:

- AAAS 4251 African Religions/Diaspora Credit Hours: (3)
- ANTH 3242 Peoples of Africa Credit Hours: (3)
- ANTH 3282 American Communities \*\* Credit Hours: (3)
- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4010 Ethnographic Methods Credit Hours: (3)
- ANTH 4051
- ANTH 4411 Urban Anthropology Credit Hours: (3)
- ANTH 4412 Neighborhood Development Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- ANTH 4660 Museum Collections Credit Hours: (3)
- ANTH 4661 Collections Research Credit Hours: (3)
- ANTH 4662 Museum Exhibitions Credit Hours: (3)
- CJUS 3510 Law and Society Credit Hours: (3)
- CJUS 4460 Race, Ethnicity and Justice in America Credit Hours: (3)
- ESCI 4431 Urban Geography Credit Hours: (3)
- ECON 4740 Health Care Economics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 3420 Race and Politics in U.S. Credit Hours: (3)
- POLS 4101 Political Statistics \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4317 Democratic Transitions Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)

- SOCI 3112 Contemporary Social Problems \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3420 Sociology of the South Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4460 Black/White Women in South Credit Hours: (3)

#### The Arts:

- ARTH 4111 Art/Archaeology of Egypt Credit Hours: (3)
- ARTH 4112 Egypt Art-Old Kingdom Credit Hours: (3)
- ARTH 4113 Egypt Art-New Kingdom Credit Hours: (3)
- ARTH 4181 Arts Africa/Oceania/N America Credit Hours: (3)
- ARTH 4183 Visual Arts of Africa Credit Hours: (3)
- ARTH 4185 African American Art Credit Hours: (3)
- ARTH 4660 Museum Collections Credit Hours: (3)
- ARTH 4662 Museum Exhibitions Credit Hours: (3)
- COMM 3360 Rhetoric of Pop Culture Credit Hours: (3)
- COMM 3361 African-American Rhetoric \*\* Credit Hours: (3)
- COMM 4341 Interpersonal Communication \*\* Credit Hours: (3)
- COMM 4364 Gendered Public Discourse Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4804 Blues Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)
- THEA 4545 Thea/African Diaspora Credit Hours: (3)

## **Alcohol and Drug Abuse Services Minor**

Alcohol and Drug Abuse Services (18 hours) This interdisciplinary minor examines societal alcohol and drug abuse from the perspectives of anthropology, counseling, criminal justice, psychology, and sociology. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

## Required Core Courses (6 hours)

• COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) (Required)

#### Choose one

- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)

## Plus 4 Additional Courses from the Following List (12 Hours)

Students may include the second class in the above list as part of the required courses for this section.

• CJUS 4152 - Drug Misuse and Abuse Credit Hours: (3)

- COUN 4781 Strategy/Crisis Intervention Credit Hours: (3)
- CRMJ 2332 Drug Identification & Effects\*\* Credit Hours: (3)
- SOCI 3501 Sociology of Deviant Behavior \*\* Credit Hours: (3)
- SOCI 3112 Contemporary Social Problems \*\* Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)

## American Sign Language Minor (18 hours)

The School of Communication Sciences and Disorders offers a minor in American Sign Language (ASL). This program is for students in various disciplines across campus who are interested in learning and using ASL. The minor is intended to teach students the fundamentals of ASL as well as enrich students' knowledge of the Deaf and Deaf Culture.

A minimum of 18 credit hours is required. The minor requires 9 credit hours of introductory and intermediate ASL (AUSP 1010, 1020, and 2010), as well as 9 hours at the upper division level (3000 and 4000 level) with choices of courses focusing on fingerspelling; deaf culture and history; ASL for speech-language pathologists, audiologists, and educators; and psychological, sociological and educational perspectives of deafness.

Note: AUSP 2020 Inter Amer Sign Language II is available, but not required for the minor.

## Core Requirements for ASL (9 hours)

Required Courses:

- AUSP 1010 Intro Amer Sign Lang | Credit Hours: (3)
- AUSP 1020 Intro Amer Sign Language II Credit Hours: (3)
- AUSP 2010 Inter Amer Sign Language | Credit Hours: (3)

## Upper Division Courses (9 hours)

Choose any three of the following courses:

- AUSP 3020 Advanced Fingerspelling Credit Hours: (3)
- AUSP 4106 Introduction to Audiology Credit Hours: (3)
- AUSP 4205 ASL for Speech, Audio, & Educ Credit Hours: (3)
- AUSP 4206 Deaf Culture and Deaf History Credit Hours: (3)
- AUSP 4207 Psychological, Sociological, and Educational Perspectives of Deafness Credit Hours: (3)
- AUSP 4208 Introduction to Interpreting ASL Credit Hours: (3)
- AUSP 4209 Linguistics in American Sign Language Credit Hours: (3)

## **American Studies Minor**

The American Studies minor engages students in an examination of the culture and society of the United States, with attention paid to the ways in which Americans express their basic values and give meaning to their institutions and everyday social practices. These values, institutions, and practices are a reflection, in part, of the different experiences of a people, according to their race, gender, class, and historical roots. This minor provides an opportunity to explore the commonalities and differences among Americans through an interdisciplinary course of study.

## Requirements

## Required Core Courses (6 hours)

Chose two courses from this area; the other two courses may be used in the elective courses if desired.

• UNIV 3522 - American Cinema \*\* Credit Hours: (3)

- UNIV 3526 War & American Society \*\* Credit Hours: (3)
- UNIV 3531 Am Exp: Image/Narrative \*\* Credit Hours: (3)
- UNIV 3542 Baseball in America \*\* Credit Hours: (3)

#### Elective Courses (12 hours)

Select four courses from the following list; may also use the remaining two from the Required Core Courses. No more than two courses from any single department will be accepted.

- ANTH 3282 American Communities \*\* Credit Hours: (3)
- COMM 4851 Film History II Credit Hours: (3)
- COMM 4856 Gender and Film Credit Hours: (3)
- ENGL 3325 Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3)
- ENGL 3326 Af/Am Lit since Harlem Ren \*\* Credit Hours: (3)
- ENGL 3327 American Literature to 1865 \*\* Credit Hours: (3)
- ENGL 3328 American Literature since 1865 Credit Hours: (3)
- HIST 3035 Technology/Culture Am History\*\* Credit Hours: (3)
- HIST 3863 American Ideas and Culture Credit Hours: (3)
- HIST 4851 History of Women in America \*\* Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4804 Blues Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)
- SOCI 3420 Sociology of the South Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)

## **Anthropology Minor**

#### Requirements

Completion of 18 semester hours in anthropology courses, including

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ANTH 4065 Anthropological Theory Credit Hours: (3)

## **Applied Behavior Analysis Minor**

A minor in ABA can equip undergraduate students to become a registered behavior technician (RBT) and can help prepare a future or current teacher, school counselor, psychologist, paraprofessional, phsyical therapist, occupational therapist or other school-based or clinic-based support staff with a strong knowledge base of classroom management strategies, behavior change procedures, and interventions related to working with children, adolescents, and/or adults. This minor will provide both depth of foundational knowledge in ABA and the breadth of interconnected experiences to benefit many career goals or future educational goals in a number of fields. With a minor in ABA, undergraduate students will be better equipped to interact with others as members of a team, in a classroom, or as entrepreneurs. In addition, the student will be prepared for graduate work in ABA, Psychology, Counseling, Social Work, and other helping careers. All courses are all designed to meet the current standards set forth by the Behavior Analysis Certification Board (BACB) allowing the students with this minor to sit for national exam which leads to certification as a Registered Behavior Technician (RBT). An RBT is primarily responsible for the direct implementation of behavior-analytic services and working directly with the clients as they help the child and family reach their individual goals.

## Required Core Courses: 12 hours

- SPED 4111 Intro/Appl Behav Analysis Credit Hours: (3)
- SPED 4112 Assess/Measure/Appl Behav Anly Credit Hours: (3)
- SPED 4113 Appl Behav Intervent/Strateg Credit Hours: (3)
- SPED 4114 Practitioner Issues/ABA Credit Hours: (3)

#### Additional Courses: 6 hours

- SPED 2000 Foundation/Exceptional Learn Credit Hours: (3)
- SPED 3201 Behv Supt Stdnt Diverse Set Credit Hours: (3)
- SPED 3803 Classroom/Behavior Management Credit Hours: (3)
- SPED 4900 Consultation Schl/Fmly/Cmty Credit Hours: (3)

## **Art History Minor**

#### Requirements

Completion of 18 semester hours in Art History, including two courses selected from:

- ARTH 2010 World Art | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- ARTH 2030 Visual Studies/Indigenous Arts Credit Hours: (3)
- 12 semester hours from the ARTH 4000-level courses.

## **Asian Studies Minor**

## Requirements

A minimum of 18 semester hours, including

- CHIN 2010 Intermediate Chinese | Credit Hours: (3)
   and
- CHIN 2020 Intermediate Chinese II Credit Hours: (3)

or

- JAPN 2010 Intermediate Japanese I Credit Hours: (3) and
- JAPN 2020 Intermediate Japanese II Credit Hours: (3)

#### 6 Semester Hours from

- CHIN 4301 Modern Chinese Fiction Credit Hours: (3)
- HIST 3291 Modern Asia Credit Hours: (3)
- HIST 4292 Modern China 1800-Present \*\* Credit Hours: (3)
- HIST 4294 Modern Japan 1800-Present \*\* Credit Hours: (3)
- PHIL 3721 Chinese Philosophy Credit Hours: (3)

#### 6 Semester Hours from

- ESCI 4307 Thematic Studies/China Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)
- UNIV 4506 The Chinese Credit Hours: (3)

## **Banking and Financial Services Minor**

#### Requirements

## For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

Choose 9 hours from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)

#### For Students Whose Major Is Within Another College at the University (21 hours)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)

And 9 hours chosen from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)

## **Biology Minor**

#### Requirements

Completion of 18 semester hours in biology courses including

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- 10 upper division hours

#### Note

No more than four total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward minor requirements.

No more than four total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward minor requirements.

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the minor.

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

421 Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

## **Business Economics Minor**

## Requirements

For students whose major is in another college of the University:

18 semester hours in economics courses, including

- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- 12 additional upper division hours in courses as approved by the department chair.

## For students whose major is in another department in The Fogelman College of Business and Economics:

#### Either

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3) or
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)

#### Plus

nine additional upper division hours in economics approved by the department chair.

## **Business Finance Minor**

## Requirements

## For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics:

9 hours chosen from FIR 1220 or upper division hours in finance approved by the finance undergraduate career advisor or department chair.

## For Students Whose Major Is Within Another College at the University (21 hours):

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)

## **Business Information and Technology Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 3790 Enterprise Architecture \*\* Credit Hours: (3)
- MIS 4800 Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

For Students Whose Major Is Within Another College of the University (18 hours):

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 3790 Enterprise Architecture \*\* Credit Hours: (3)
- MIS 4800 Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

## **Chemistry Minor**

## Requirements

Completion of 20 semester hours in chemistry courses, including

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

• 12 semester hours selected from courses applicable to the chemistry major and including at least two chemistry laboratory courses.

## **Child Development Minor**

This interdisciplinary minor will attract students with majors in education, human services, nonprofit administration, psychology, social work, and related areas.

NOTE: Students who are pursuing concentrations in Child Development & Family Studies, Child Life Specialist, Early Care & Learning, Early Intervention Specialist, and Preschool & Childcare Administration are not eligible to pursue this minor as the courses are included in these concentrations.

## Requirements

Required Courses (9 hours)

- CDFS 3401 Parent Child Relations Credit Hours: (3)
- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- PSYC 3103 Child Psychology \*\* Credit Hours: (3)

#### Plus 9 Additional Upper Division Hours From:

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- CDFS 3410 Soc Emotion Lrng Early Child Credit Hours: (3)
- CDFS 4220 Understand Chldn/Behv/Guide Credit Hours: (3)
- HIST 4863 History/Childhood in America \*\* Credit Hours: (3) Choose one PSYC course option below:
- PSYC 3305 Psyc Learning/Memory\*\* Credit Hours: (3)
- PSYC 4034 Children Soc Relationships Credit Hours: (3)
- PSYC 4102 Abnormal Child Psych Credit Hours: (3)
- SWRK 4934 Child Welfare Policy/Services Credit Hours: (3)

## **Classical Studies Minor**

Those who value education because they value the ability to think clearly and express ideas powerfully, often choose the liberal arts. The Classical Studies Minor is proposed to expose students to the very foundation of the liberal arts and "Western Tradition." A minor in Classical Studies can serve as a prestigious and powerful springboard for professional careers in areas such as law, journalism, medicine, and business. Those who are interested in the beauty and study of antiquity may also pursue careers in teaching, academics, or museum work. The Classical Studies minor is comprised of courses which span different departments and colleges.

### Requirements

A total of 18 hours as follows:

#### Core:

9 hours from the following with no more than 2 courses from any one subject area:

- LATN 1010 Elementary Latin I Credit Hours: (3)
- LATN 1020 Elementary Latin II Credit Hours: (3)
- LATN 2010 Intermediate Latin | Credit Hours: (3)
- LATN 2020 Intermediate Latin II Credit Hours: (3)
- CLAS 2481 Mythology \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)

#### Elective Courses:

9 hours from the following with no more than 2 courses from any one subject area:

- ARTH 4111 Art/Archaeology of Egypt Credit Hours: (3)
- ARTH 4112 Egypt Art-Old Kingdom Credit Hours: (3)
- ARTH 4113 Egypt Art-New Kingdom Credit Hours: (3)
- ARTH 4121 Ancient Art Near East Credit Hours: (3)
- ARTH 4123 Greek Art Credit Hours: (3)
- ARTH 4124 Roman Art Credit Hours: (3)
- ARTH 4125 Art/Archaeology Pompeii Credit Hours: (3)
- ARTH 4129 Ancient/Medieval Architecture Credit Hours: (3)
- CLAS 3021 Medical Terminology Credit Hours: (3)
- CLAS 3413 Greek Lit in Translation Credit Hours: (3)

- CLAS 3414 Roman Lit in Translation Credit Hours: (3)
- CLAS 4780 Individual Study Classics Credit Hours: (1-3)
- CLAS 4791 Studies in Classics Credit Hours: (1-3)
- ENGL 4461 Bible as Literature Credit Hours: (3)
- HIST 3320 Ancient World \*\* Credit Hours: (3)
- HIST 4320 Ancient Near East Credit Hours: (3)
- HIST 4321 Greek Experience \*\* Credit Hours: (3)
- HIST 4322 The Roman World Credit Hours: (3)
- HIST 4323 Egypt of the Pharaohs \*\* Credit Hours: (3)
- HIST 4361 History of Byzantine Empire \*\* Credit Hours: (3)
- PHIL 3001 History of Ancient Philosophy \*\* Credit Hours: (3)
- PHIL 4211 Ancient Philosophy Credit Hours: (3)
- POLS 3401 Legal/Pol Thght Classical Credit Hours: (3)

## **Cognitive Science Minor**

The University of Memphis is the home of many interdisciplinary research centers, including the Institute for Intelligent Systems. The IIS has several full-time faculty and faculty affiliates that participate in research focused on perception, cognition, and intelligence. They are also host to an interdisciplinary minor in Cognitive Science, available to any undergraduate not minoring in Psychology (see section on the Cognitive Science concentration under the Psychology major for student seeking training in this area).

Students majoring in Philosophy, Computer Science, Management, Economics, and many more can benefit from taking coursework in diverse areas that interrelate in their focus on human and computer thinking and intelligence.

The goals of the minor are to 1) develop computational thinking 2) develop a unique perspective and approach to problem solving and 3) gain depth and appreciation for issues that pertain to cognition and intelligence and 4) develop computer skills desirable and useful in industry, research, and teaching.

#### Requirements

Core (9 hours)

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- PSYC 3303 Thinking/Cognitive Processes \*\* Credit Hours: (3)
- PSYC 3530 Psychology of Language Credit Hours: (3)

#### Computer Science Requirement (3-4 hours)

Take one of the following courses:

- IIS 1010 Intro to Intelligent Systems Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)

#### Electives (6-7 hours)

Select two courses from the following (cannot be from the Major):

- PHIL 3460 Nature/Mind/Knowledge Credit Hours: (3)
- PHIL 4421 Philosophy of Mind Credit Hours: (3)
- PHIL 4661 Philosophy of Science Credit Hours: (3)
- ECON 4512 Behavioral Economics Credit Hours: (3)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 4720 Intro Artificial Intelligence Credit Hours: (3)
- MATH 2120 Differential Equations\*\* Credit Hours: (3)

- MATH 4083 Dynamical Systems/Chaos Credit Hours: (3)
- ENGL 3511 Intro to Linguistics \*\* Credit Hours: (3)

## **Communication Minor**

#### Requirements

Any student wishing to minor in any area in the Department of Communication should see the department chair who will assign an appropriate advisor. The minor must consist of at least 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor with the approval of the department chair.

## **Community Action and Social Change Minor**

The Community Action and Social Change Minor will bridge theory and action in order to provide the structure for students that desire to be change makers in their local and global communities. The minor is designed with a community focus to bring about a more sustainable, equitable, and just world; the minor aims to address social and environmental issues, develop community-engaged knowledge and skills, and better prepare students for modern challenges and careers that contribute to the public good. The minor is designed to guide students to cultivate civic responsibility, take part in collective action, and gain valuable mentorship from community experts. Intended to complement many of our majors, the Community Action and Social Change minor provides students across academic disciplines a sustainable and developmental path towards deeper and more meaningful engagement in the community.

#### Required Courses: 18 hours

- UNIV 2200 Introduction to Student Development Credit Hours: (3)
- UNIV 3303 Phil/Theory of Leadership Credit Hours: (3)
- UNIV 3304 Leadership & Social Change Credit Hours: (3)
- UNIV 3305 Strengths Based Leadership Credit Hours: (3)
- UNIV 4110 Internship\*\* Credit Hours: (3-6)
- UNIV 4995 Senior Project\*\* Credit Hours: (3)

## **Computer Science Minor (21 hours)**

Completion of 21 semester hours in computer science courses, including the following:

## Minor Requirements

- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- and 6 additional upper division semester hours. Note: COMP 1000 COMP 1100 COMP 1800 COMP 3050 COMP 4001 COMP 4014 may not be used to fulfill the minor requirement.

## **Creative Mass Media Minor**

To complete the minor in Creative Mass Media, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

426

## Creative Mass Media Minor Core

To complete a minor in Creative Mass Media, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)

Select two of the following:

- ADVR 3324 Creative Strategy Credit Hours: (3)
- CRMM 4140 Publication Design Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- CRMM 4526 Advanced Photojournalism Credit Hours: (3)
- CRMM 4550 Web Publish II: html/CSS Credit Hours: (3)
- CRMM 4560 Interactive Media Design Credit Hours: (3)
- CRMM 4900 Creative Media Lab Credit Hours: (3)

Coursework for all minors will be determined by the student in conference with the advisor with the approval of the department chair.

## **Criminology and Criminal Justice Minor**

## Requirements

Completion of 18 hours in criminal justice courses including

• CJUS 1100 - Intro/Criminal Justice \*\* Credit Hours: (3)

either

or

- CJUS 2226 Introduction to Police \*\* Credit Hours: (3)
- CJUS 2326 Introduction to Courts Credit Hours: (3)
- CJUS 2426 Intro/Corrections in America \*\* Credit Hours: (3) and
- CJUS 3130 Research Methods CJUS \*\* Credit Hours: (3) and
- CJUS 3540 Criminology Credit Hours: (3)
- and 6 additional upper-division hours in Criminology and Criminal Justice courses

## **Culinary Arts Minor**

The 18 hour minor is designed for students that would like to gain basic hands-on expertise and knowledge in Culinary Arts. Students will learn basic knife skills, sanitation, cooking methods, culinary terminology, nutrition analysis, and menu planning. Students choosing this minor can secure entry-level positions in the foodservice industry or start second careers in the hospitality industry. The minor can also serve as elective courses for students in other majors. For more information contact kwci@memphis.edu

## **Requirements:**

- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3013 Advanced Culinary Skills Credit Hours: (3)
- HPRM 3014 Pastry & Baking Credit Hours: (3)
- HPRM 3015 Food Analysis Credit Hours: (3)
- HPRM 3016 Garde Manger Credit Hours: (3)
- HPRM 3810 Food Safety & Sanitation in Hospitality Credit Hours: (3)

## **Dance Minor**

Any student wishing to minor in Dance should see the administrative secretary who will assign an advisor. The minor must consist of a minimum of 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor.

## **Earth Sciences Minor**

### Requirements

Completion of 18 semester hours in earth sciences courses, at least 9 of which must be upper division hours.

## **Economics Minor**

### Requirements

To receive a minor in Economics, a student is required to take 18 credit hours, (six courses) in economics. Six of those hours (two courses) must be ECON (TNe) 2010 and ECON 2020. Of the remaining 12 hours (four courses), all of them must be upperdivision courses in economics, i.e., 3000-level or 4000-level courses. One of those courses must be either Microeconomic Theory (ECON 3310) or Macroeconomic Theory (ECON 3320). The other three courses (nine hours) are upper-division elective courses.

## **Educational Psychology & Research Minor**

## Requirements

The minor consists of 18 credits consisting of the following REQUIRED and ADDITIONAL coursework.

#### Required core courses (9 hours)

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- EDPR 3121 Learning Process/Assessment Credit Hours: (3)
- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)

Additional 9 credit hours

- EDPR 3302 Child/Adolescent Development Credit Hours: (3)
- EDPR 4008 Prob: Ed Psych/Research Credit Hours: (1-3)
- EDPR 4009 Directed Reading Credit Hours: (1-3)
- EDPR 4010 Supervised Research Credit Hours: (1-3)
- EDPR 4301 Early Child Dev/Begin Teacher Credit Hours: (3)

## **Emergency Management Minor**

The interdisciplinary Emergency Management Minor is designed for students with a diversity of backgrounds and interest in applying that background to emergency management, community resilience to disaster, environmental hazards mitigation, emergency management response, and business continuity/disaster recovery, and will address the following critical knowledge:

- the physical and social dimensions of disasters through combining knowledge from various physical, social, and applied disciplines;
- the intersection of public policy to disaster risk, response, and mitigation;
- the intersection of the private, nonprofit, and governmental sectors and how this effects emergency preparedness, mitigation, and recovery;
- sustainable development, planning for and response to extreme events and change in our physical and human landscapes; and
- communication dynamics and persuasive communication.

## Requirements

#### The Minor

18 semester hours, 9 hours from the core and 9 hours from the list of approved electives.

#### Core (9 hours)

• EMGT 3100 - Seminar in Emergency Management Credit Hours: (3) (ESCI 3100/PADM 3100)

#### Select One from:

- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 3131 Severe Weather Credit Hours: (3)
- CJUS 4190 Terrorism Soc/Legl Prsp \*\* Credit Hours: (3)

#### Capstone Experience:

pre-approved internship experience related specifically to emergency management policy, procedures, planning, etc. Alternatively, the student could complete a research seminar/project on a relevant and pre-approved emergency management topic. Select one from:

- EMGT 4000 Internship Credit Hours: (3)
- ESCI 4621 Investigations In GEOG Credit Hours: (1-3)
- CJUS 4100 Ind Dir Studies Credit Hours: (1-6)

## Electives (9 hours)

Three courses (9 hours), none of which have been used to fulfill the core requirements, from among the following groups with no more than two courses (6 hours) from the same group:

#### Physical Management:

- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 3131 Severe Weather Credit Hours: (3)
- ESCI 4551 Urban Planning Studio Credit Hours: (3)
- ARCH 4551 Site and Environmental Planning

#### Human (Social/Cultural/Legal/Political):

- CJUS 4190 Terrorism Soc/Legl Prsp \*\* Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)
- SOCI 3701 Individual and Society \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)

#### Note

With approval from the Emergency Management advisor, special topics courses related to emergency management topics may be substituted to fulfill requirements for the minor.

## **Engineering Technology Minor**

## Requirements

A student must complete 18 hours of Engineering Technology coursework (observing prerequisites), 12 of which must be upperdivision, selected in consultation with a departmental advisor. It is understood that some prerequisites may be satisfied by coursework from other departments and programs.

## **English Minor**

### Requirements

Completion of 12 upper division hours in English (excluding ENGL 3500 and ENGL 3603).

## **Entrepreneurship Minor**

### Requirements

#### For All Majors (18 hours):

- UNIV 2555 Intro Creativity/Innov/Design Credit Hours: (3)
- MGMT 2820 Intro to Entrepreneurship \*\* Credit Hours: (3)
- elective
- MGMT 4920 Independent Study in Entrepreneurship Credit Hours: (1-3)
- MGMT 4921 Internship in Entrepreneurship Credit Hours: (1-6) or
- UNIV 4110 Internship\*\* Credit Hours: (3-6)
- MGMT 4820 Advanced Entrepreneurship \*\* Credit Hours: (3)

## **Environmental Studies Minor**

The Interdisciplinary Environmental Studies Minor Program (18 hours) is intended to provide all students with the opportunity to obtain a broad-based knowledge of the environmental issues facing our planet; knowledge that spans the biological-physical threats and solutions, as well as behavioral, social, economic, and design implications. The Environmental Studies Program fosters interdisciplinary study among diverse course offerings in Anthropology, Architecture, Biology, Business, Chemistry, Earth Sciences, Economics, Philosophy, Physics, and Political Science.

## Requirements

## Students Pursuing Behavioral-Humanistic-Design Emphasis

430

- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3) and
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1)
- CHEM 1010 Chemistry of Materials\*\* Credit Hours: (3) and
- CHEM 1011 Chemistry of Materials Lab \*\* Credit Hours: (1)
- ESCI 1020 Landforms \*\* Credit Hours: (4)

or

- ESCI 1103 The Human Planet Credit Hours: (4)
- ESCI 1010 Weather and Climate Credit Hours: (4)
- ARCH 3421 Environmental Systems Credit Hours: (3) with ARCH 3713 Design Studio 3

#### Students Pursuing an Environmental Science Emphasis

Students pursuing an environmental science emphasis must select two courses (6 hours) in different disciplines from the following offerings:

- BIOL 3050 Ecology Credit Hours: (4)
- BIOL 4055 Ecology/Environment Iss Credit Hours: (3)
- CHEM 4001 Environmental Chemistry Credit Hours: (3)
- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 4252 Global Environmental Change Credit Hours: (3)
- PHYS 4222 Environmental Physics Credit Hours: (3)

#### All Environmental Studies Students

All Environmental Studies students also select three elective courses (9 hours) from the following offerings:

- ESCI 4201 Urbanization/Environment Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- ARCH 4421 Sustainable Design Credit Hours: (3)

#### Additional Requirements

In addition to these elective courses, all Environmental Studies students are required to take one core course:

• ENVR 4000 - Environ Studies Directed Rsrch Credit Hours: (3)

## Food and Beverage Management Minor

This 18-credit Food and Beverage Management minor is specifically designed for students who are interested in managing and/or owning restaurants or other food and beverage establishments. The minor will provide a foundation in food and beverage management, account and cost controls, and advanced knowledge and understanding of the skills needed to succeed personally and professionally as a manager/owner in this ever-growing industry. Students will apply management principles and develop their culinary skills in the new restaurant and special event space at the Kemmons Wilson Culinary Institute.

## Required Courses: 18 hours

• HPRM 2012 - Intro to Culinary Arts Credit Hours: (3)

- HPRM 2999 Purchase/Hospitality Industry Credit Hours: (1)
- HPRM 3050 Food/Beverage Controls Credit Hours: (3)
- HPRM 3060 Food & Bev. Production Theory Credit Hours: (1)
- HPRM 3061 Food and Beverage Production Lab Credit Hours: (1)
- HPRM 3062 Restaurant Management Service Lab Credit Hours: (1)
- HPRM 3680 Intro to Wine & Spirits Credit Hours: (3)
- HPRM 3810 Food Safety & Sanitation in Hospitality Credit Hours: (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)

## **Graphic Design Minor**

## Requirements

Completion of 18 semester hours as follows:

- ART 2223 Computer Assisted Graphc Des Credit Hours: (3)
- ART 2213 Typographic Design | Credit Hours: (3)
- ART 2219 Visual Thinking Credit Hours: (3)
- ART 3213 Typographic Design II Credit Hours: (3)
- ART 3219 Image Design Credit Hours: (3)
- ART 4224 History Graphic Design Credit Hours: (3)

## Healthcare and Society Minor

This minor provides students with the opportunity to develop the additional skills that professional schools in health and medical fields are seeking outside of the required science coursework. The course options are designed to enhance the student's understanding of personal wellness, social inequalities in healthcare, provider-patient dynamics and communication, biomedical ethics, and cultural influences on health behavior.

## Requirements

#### The Minor:

18 semester hours of required courses and electives:

#### **Required Core Courses:**

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3) and
- COMM 3012 Health Communication \*\* Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3) \*
  - \* Students planning to take the MCAT are encouraged to take both PSYC 1030 and SOCI 1010 but only one course will count toward the minor requirements.

#### One Course from Each of these Three Categories:

#### Health and Wellness:

- EDPR 2111 Development Across Lifespan Credit Hours: (3)
- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- NUTR 2202 Nutrition \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Cultural Competency:

- ANTH 4521 Culture, Soc & Mental Health Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- ECON 4740 Health Care Economics Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)

Social and Psychological Foundations:

- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- PSYC 3102 Abnormal Psychology Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3506 Human Sexuality Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- SOCI 4541 Sociology of Aging Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)
- SOCI 4852 Sociology of Mental Illness Credit Hours: (3)

## **History Minor**

#### Requirements

Minors must complete 21 semester hours in history courses. Of the 21 hours, at least 9 hours must be from HIST 1110, 1120, 2010, and 2020; and at least 9 hours must be in upper- division courses.

- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- HIST 2010 U S to 1877 Credit Hours: (3)
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3)
- at least 9 hours must be in upper- division courses.

## **Hospitality and Resort Management Minor**

#### Requirements

To receive a minor in Hospitality and Resort Management, the student is required to take 18 credit hours as follows:

- HPRM 1050 Business of Hospitality Credit Hours: (3)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3330 Managing Hotel and Resort Operations Credit Hours: (2)
- HPRM 3331 Lodging Management Lab Credit Hours: (1)
- HPRM 4320 Hospitality Services Mktg Credit Hours: (3)
- HPRM 4620 Hospitality Operational Anlys Credit Hours: (3)
- HPRM 4700 Integrative Challenge Credit Hours: (3)

## **International and Global Studies Minor**

# Requirements

Completion of 18 semester hours, consisting of 6 hours from among the following courses (2 courses):

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3)
- INTL 1101 Introduction to International and Global Studies Credit Hours: (3)
- UNHP 1101 Humanities/Global Challenge Credit Hours: (3)
- UNHP 1102 Social Scien/Global Challenge Credit Hours: (3)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)
- One upper division course in modern foreign languages\*\* Credit Hours: (3)

and

12 hours upper division hours (4 courses) from courses that count toward the International and Global Studies, (B.A.) major

**Note:** A maximum of six hours from either study abroad or internship credits may be used towards fulfilling the requirements of the IS major (subject to approval by the IS director).

# **International Business Minor**

### Requirements

# For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics:

12 hours from the following courses with the approval of the International Business advisor:

- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)

#### For Students Whose Major Is in Another College of the University:

The student will take a minimum of 18 hours in The Fogelman College of Business and Economics, at least 9 hours of which must be chosen from the following:

- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)

- FIR 4550 International Finance \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)

# **Journalism Minor**

To complete the minor in Journalism, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

### Journalism Minor Core

- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- JOUR 3526 Multimedia Storytelling Credit Hours: (3)

#### Select One of the Following: (3 hours)

- JOUR 3120 Reporting Credit Hours: (3)
- JOUR 3629 Broadcast Reporting Credit Hours: (3)

#### Select Two of the Following: (6 hours)

- JOUR 3130 Feature Writing/Reporting \*\* Credit Hours: (3)
- JOUR 4124 Data Writing/Reporting Credit Hours: (3)
- JOUR 4150 Sports Writing/Reporting Credit Hours: (3)
- JOUR 4155 Multimedia Sports Reporting Credit Hours: (3)
- JOUR 4160 Food Writing/Reporting Credit Hours: (3)
- JOUR 4170 Business Writing/Reporting Credit Hours: (3)
- JOUR 4180 Public Issues Writing/Reporting Credit Hours: (3)
- JOUR 4190 Opinion Writing/Reporting Credit Hours: (3)
- JOUR 4530 Innovative Storytelling Techniques Credit Hours: (3)
- JOUR 4629 TV News Writing/Reporting Credit Hours: (3)
- JOUR 4639 TV News Producing Credit Hours: (3)
- CRMM 4140 Publication Design Credit Hours: (3)
- CRMM 4500 Web Publish I: html/CSS Credit Hours: (3)
- CRMM 4526 Advanced Photojournalism Credit Hours: (3)
- CRMM 4550 Web Publish II: html/CSS Credit Hours: (3)
- CRMM 4920 Information Design Credit Hours: (3)

# Legal Studies Minor

The Legal Studies minor is designed for students whose personal interests or professional aspirations call for a more concrete understanding of how the American legal system works in modern practice. This minor goes beyond looking at law from a theoretical, sociological, or philosophical perspective and instead exposes students to the operational nuts-and-bolts of today's major civil and criminal practice areas, including tort law, business law, and legal research and analysis. The minor is open to students majoring in any area of study in any undergraduate college or school **except** students pursuing a BPS in Legal Studies.

# **Required Courses**

- LEGL 2400 Legal Ethics Credit Hours: (3)
- LEGL 2410 Intro to Law Credit Hours: (3)
- LEGL 3150 Legal Research/Writing | Credit Hours: (3)
- LEGL 3420 Torts Credit Hours: (3)

## Choose one from the following:

- LEGL 3410 Contracts Commercial Law Credit Hours: (3) or
- LEGL 3430 Business Associations Credit Hours: (3) or
- LEGL 3487 Admin Law/Procedure Credit Hours: (3)

# Choose one from the following:

- LEGL 3440 Civil Procedure Credit Hours: (3)
- LEGL 3486 Criminal Law & Procedure Credit Hours: (3) or
- LEGL 4200 Healthcare Liability Credit Hours: (3) or
- LEGL 4300 Immigration Law Credit Hours: (3)

# Legal Thought and Liberal Arts Minor

The minor in Legal Thought and Liberal Arts is designed to provide an interdisciplinary liberal arts program for students in any major who intend to enter the legal profession. The minor will be of particular benefit to pre-law students whose majors are more professional in nature and who are not exposed to the broader liberal arts curriculum. Students will be introduced to major intellectual traditions of the West and to ethical, social, and economic issues of significance to our time. The courses in the minor require that students read critically, think logically, and write clearly - attributes required of persons in the legal profession. Students wishing to minor in Legal Thought and Liberal Arts should contact the Pre-Professional Advisor in 107 Scates Hall.

# Requirements

### The Minor:

18 semester hours of required courses and electives:

## Required Core Course:

- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- ENGL 3604 Persuasive Writing \*\* Credit Hours: (3)
- ENGL 4602 Adv Composition \*\* Credit Hours: (3)

### Electives:

Select one course from four of the following five groups (each course chosen must be from a different group):

### Economic Context of the Law:

- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- ECON 4210 Public Economics Credit Hours: (3)
- ECON 4220 Urban Economics Credit Hours: (3)
- ECON 4250 Econ Poverty/Discrimination Credit Hours: (3)

### Historical Context of the Law:

• HIST 3840 - U S Constitutional History Credit Hours: (3)

### Practical Foundations of Jurisprudence:

- CJUS 3510 Law and Society Credit Hours: (3)
- POLS 3219 Judicial Process \*\* Credit Hours: (3)
- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)

### Theoretical Foundations of Jurisprudence:

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3516 Philosophy of Law \*\* Credit Hours: (3)
- PHIL 4551 Social and Political Philosophy Credit Hours: (3)
- POLS 3401 Legal/Pol Thght Classical Credit Hours: (3)
- POLS 3402 Legal/Political Thght Modern Credit Hours: (3)
- POLS 3405 Intro Law/Jurisprudence Credit Hours: (3)
- UNIV 3580 Hebrew and Greek Legacy\*\* Credit Hours: (3)

# Critical Reading and Thinking:

- Any 4000-level English literature ENGL 4230-ENGL 4461 course
  - or
- ENGL 4602 Adv Composition \*\* Credit Hours: (3) (if not taken as the core) or
- Any upper-division philosophy course not listed above.

### Note

Some of these courses may have prerequisites. Students are responsible for obtaining permission from the instructor to enroll in the course if they have not fulfilled those prerequisites.

# **Management Minor**

# Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

437

- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- and 6 upper division semester hours in management

For Students Whose Major Is Within Another College of the University (18 hours):

- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3215 Management of Human Resources \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- and 6 upper division semester hours in management

# **Marketing Management Minor**

## Requirements

For Students Whose Major Is in Another College of the University (18 hours):

- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)

Six Semester Hours Chosen by the Student From the Following:

- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4230 Services Marketing Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MKTG 4550 MKTG Business Solutions for Sustainability Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

# For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)

### Three Semester Hours Chosen by the Student From the Following:

- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)

- MKTG 4230 Services Marketing Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)
- MKTG 4550 MKTG Business Solutions for Sustainability Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

# **Mathematical Sciences Minor**

### Requirements

A minimum of 20 semester hours, including

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1920 Calculus II\*\* Credit Hours: (4)

#### 9 Additional Upper Division Semester Hours

9 additional upper division semester hours in MATH courses approved by the Chair or Chair's designee of the Department of Mathematical Sciences

### Plus One of

- COMP 2700 Discrete Structures Credit Hours: (4)
- MATH 2702 Intro Proof/Fundamental Math Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- or an additional upper division MATH course approved by the Chair or Chair's designee of the Department of Mathematics.

# **Medical Assisting Minor**

The College of Health Sciences offers a 24-credit hour minor available to students across campus. The minor is intended to enrich students' current plan of study and provide an opportunity to learn valuable skills applicable in the clinical setting. Coursework in the Medical Assisting minor allows students to obtain the necessary knowledge and practical skills needed to sit for the national certification exam in Medical Assisting. If students do not desire to obtain a certificate, the coursework should be helpful if they choose to pursue other entry-level healthcare positions for which such knowledge and skills may be desired.

Students seeking part-time employment as a medical assistant while completing their undergraduate degree may be interested in this minor, while those students who plan to apply to graduate programs requiring patient contact hours prior to acceptance may also be interested. The knowledge and skills gained through the minor coursework may allow students to be more marketable for entry-level healthcare employment opportunities.

### Medical Assisting Minor (24 Hours)

- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
- HLSC 3000 Introduction to Medical Assisting Credit Hours: (3)
- HLSC 3001 Laboratory Techniques in Medical Assisting Credit Hours: (4)
- HLSC 3002 Patient Interaction in Medical Assisting Credit Hours: (3)

- HLSC 3003 Medical Office Administration Credit Hours: (3)
- HLSC 3004 Medical Assisting Certification Review Preparation Credit Hours: (1)

# **Military Science Minor**

### Requirements

A minor in Military Science can be obtained through meeting the following requirements: 18 semester hours consisting of

- ARMY 3200 Warfighting Functions/Training Credit Hours: (2)
- ARMY 3201 Warfighting Functions/Training Lab Credit Hours: (1)
- ARMY 3205 History of Military Tactics Credit Hours: (2)
- ARMY 3300 Small Unit Leadership Credit Hours: (2)
- ARMY 3301 Small Unit Leadership Lab Credit Hours: (1)
- ARMY 4200 The Army Officer Credit Hours: (2)
- ARMY 4201 The Army Officer Lab Credit Hours: (1)
- ARMY 4300 Company Grade Leadership Credit Hours: (2)
- ARMY 4301 Company Grade Leadership Lab Credit Hours: (1)
- Physical Training courses **Credit hours:** (4)

# **Music Minor**

# Requirements

Students wishing to declare a minor in music must first apply to the School of Music and audition on their instrument (or voice) for acceptance. Music minor applicants also take a music theory assessment to determine proper music theory placement. The minor in Music consists of 21 credit hours and is available to any student who completes the following requirements:

### Applied Music Individual Instruction (4 hours)

### 2 Semesters Appropriate Ensembles (2 hours)

### Music Theory (6 hours)

- MUTC 1008 Music Theory | Credit Hours: (3)
- MUTC 1009 Music Theory II Credit Hours: (3)

### Choose One From (3 hours)

- MUHL 3301 History of Music to 1750 Credit Hours: (3)
- MUHL 3302 History of Music Since 1750 Credit Hours: (3)
- MUHL 3303 Western Music History Credit Hours: (3)

### Upper Division Electives (6 hours)

### In Addition

All music minors are required to attend a minimum of 25 concerts or recitals.

# **Naval Sciences Minor**

# Requirements

Completion of 18 semester hours in the following:

- NAVY 1500 Introduction to Naval Science Credit Hours: (3)
- NAVY 1600 Sea Power/Maritime Affairs Credit Hours: (3)
- NAVY 2500 Naval Leadership & Management Credit Hours: (3)
- NAVY 4600 Naval Leadership and Ethics Credit Hours: (3) (9 hours total)

### Select Three Courses From the Following Electives:

- NAVY 2600 Naval Ship Systems I/Engr Credit Hours: (3)
- NAVY 3500 Navigation Credit Hours: (3)
- NAVY 3520 Evolution of Warfare Credit Hours: (3)
- NAVY 3600 Naval Operations & Seamanship Credit Hours: (3)
- NAVY 3620 Officer Candidate School Prep Credit Hours: (3)
- NAVY 4500 Naval Ship Systems II/Weapons Credit Hours: (3)
- NAVY 4520 Fundamentals of Maneuver Warfare Credit Hours: (3)

### Note

The Naval Science Minor and all Naval Science courses do not require enrollment in the Naval ROTC program and are open to all University of Memphis students.

# Nonprofit Management Minor

The Division of Public and Nonprofit Administration offers an interdisciplinary minor in Nonprofit Management which includes courses that address competencies necessary for work in nonprofit organizations. The minor is open to students majoring in any department in the University or to special students who wish to enroll in order to take such a program.

Students who complete this minor and specified co-curricular activities will be eligible for certification in Nonprofit Professional (CNP) credential by the Nonprofit Leadership Alliance. The certification program is designed to build competencies in nonprofit administration through coursework, internships, volunteer opportunities, student association leadership activities and professional development workshops.

# Requirements

### The Minor:

18 semester hours, three hours of a required course, and 15 hours from the guided electives.

### Required course (3 hours):

• PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3)

Guided electives (15 hours):

Choose one from each category: (3 hours):

#### Accounting and Financial Management:

• ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

- PADM 4227 Issues/Nonprofit Admin Credit Hours: (3)
- PADM 4228 Grant Development/Management Credit Hours: (3)

#### Organization and Administration:

- PADM 3601 Public Admin\*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

#### Communication Skills:

- COMM 4342 Small Group Communication Credit Hours: (3)
- COMM 4375 Intercultural Communication \*\* Credit Hours: (3)
- COMM 4380 Communication and Conflict \*\* Credit Hours: (3)
- COUN 4621 Human Interactions Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- SWRK 3902 Human Behavior/Soc Envrnmnt Credit Hours: (3)

#### Nonprofit Context:

- ANTH 4412 Neighborhood Development Credit Hours: (3)
- PADM 4412 Neighborhood Dev/Social Entrep Credit Hours: (3)
- ART 3411 Art for Children Credit Hours: (3)
- CSED 3302
- PADM 3501 Civic Engagement, Voluntarism Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- PSYC 3103 Child Psychology \*\* Credit Hours: (3)
- SOCI 4923
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)

#### Nonprofit Organizations:

- PADM 4231 Admin Internship Credit Hours: (3-12)
- SWRK 4830 Field Instruction Soc Work | Credit Hours: (3) and
- SWRK 4831 Field Instruction Soc Work II Credit Hours: (4)
- or another approved internship course.

# Nutrition, Health & Wellness Minor

The minor is intended to enrich students' current plan of study and provide an opportunity to learn valuable skills and information applicable within healthcare settings. All students interested in pursuing this minor will be allowed to do so.

Completion of 18 semester hours with a minimum grade of C including NUTR 2202, HLSC 2100, either ESMS 2015 or HMSE 2000 and HMSE 2007, and 9 credit hours of electives from the groups listed below.

### Required (6 hours)

- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)

### Choose from the following (3 hours)

- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3) OR
- HMSE 2000 Health/Sport Sc Terminology Credit Hours: (2)
   AND
- HMSE 2007 Careers in Health Studies Credit Hours: (1)

# 9 additional credit hours

Students must choose 9 credit hours of electives from the following groups:

Upper-division hours in ESMS\*\*

Upper-division hours in PETE\*\*

Upper-division hours in HCL\*\*

Upper-division hours in NUTR\*\*

Upper-division hours in HMSE\*\*

Upper-division hours in HLSC\*\*

\*\*Students majoring in a College of Health Sciences program of study must take courses outside of their current concentration to satisfy the 9 credit-hour elective requirement

# **Pastry and Baking Minor**

In this 18-credit hour minor, the expert instructors at the Kemmons Wilson Culinary Institute will cover baking and pastry techniques as well as kitchen and restaurant management skills in our new state-of-the-art facility. The Pastry and Baking Minor will provide specialized academic and technical skills that will help prepare students for careers as pastry chefs and bakery managers.

# Required Courses: 18 hours

- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3014 Pastry & Baking Credit Hours: (3)
- HPRM 3021 Artisan Breads and Pastries Credit Hours: (3)
- HPRM 3022 Plated Desserts Credit Hours: (3)
- HPRM 3023 Chocolate and Confections Credit Hours: (3)
- HPRM 3024 Contemporary Cakes Credit Hours: (3)

# **Philosophy Minor**

## Requirements

Completion of 18 semester hours in philosophy courses, including

- PHIL 1101 Intro to Philosophy Credit Hours: (3)
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- PHIL 1311 Critical Thinking \*\* Credit Hours: (3)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- 12 upper division semester hours

### Note

In consultation with the coordinator of undergraduate studies in philosophy, a student may design a minor (18 hours) that applies to the student's major area of study.

# **Photography Minor**

# Requirements:

Completion of 18 semester hours as follows:

- ART 2701 Photography | Credit Hours: (3)
- ART 2702 Photography II Credit Hours: (3)
- ART 3701 Photography III Credit Hours: (3)

# Select two of the following:

- ART 4526 Advanced Photojournalism Credit Hours: (3)
- ART 4701 Color Photography Credit Hours: (3)
- ART 4702 Photographic Material/Process Credit Hours: (3)
- ART 4703 Alternative Photogrphc Process Credit Hours: (3)
- ART 4704 Photographic Lighting Credit Hours: (3)
- ART 4705 Video for Artists Credit Hours: (3)

# Select one of the following:

- ARTH 4721 History Photography | Credit Hours: (3)
- ARTH 4722 History Photography II Credit Hours: (3)

# **Physics Minor**

# Requirements

Completion of 20 semester hours in physics courses, including

- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)

• PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable but not recommended)

• 12 additional upper division hours.

# **Political Science Minor**

# Requirements

To complete the minor in Political Science, a student must earn 18 hours in political science discipline to the following conditions: a) students must complete at least 3 hours each in three of the four areas listed in the Political Science, (B.A.); b) students must complete at least 9 hours in courses at the 3000-level or higher; c) no more than 6 hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and studies abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 18 hours required for a minor in Political Science.

# **Pre-Health Professions Minor**

24 Credit minor including prerequisites for all 15 pre health profession tracks. Students should still seek advice from the Pre Health advisor for a list of specific courses needed for their chosen profession.

## Lower division courses: Choose 15 hours

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- BIOL 1230 Microbiology \*\* Credit Hours: (3)
- BIOL 1231 Microbiology Lab \*\* Credit Hours: (1)
- BIOL 2010 Anatomy/Physiology I\*\* Credit Hours: (3)
- BIOL 2011 Anat/Physiology I Lab \*\* Credit Hours: (1)
- BIOL 2020 Anatomy/Physiology II\*\* Credit Hours: (3)
- BIOL 2021 Anat/Physiology II Lab \*\* Credit Hours: (1)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- NUTR 2202 Nutrition \*\* Credit Hours: (3)
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab I Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

### Upper division courses: Choose 9 hours

- ANTH 3500 Anth of Global Health \*\* Credit Hours: (3)
- ANTH 4111 Evolution and Human Health Credit Hours: (3)
- ANTH 4511 Medical Anthropology Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 3500 Micro I/Fundmntl Aspect Credit Hours: (3)
- BIOL 3505 Gen Microbiology Lab Credit Hours: (2)
- BIOL 3620 Comp Anatomy of Vertebrts Credit Hours: (5)
- BIOL 3730 Vertebrate Physiology Credit Hours: (4)
- BIOL 4511 BIOCHEMISTRY | Credit Hours: (3)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 4511 Biochemistry | Credit Hours: (3)
- CLAS 3021 Medical Terminology Credit Hours: (3)
- EDPR 4541 Fundmntl/Applied Stat Method Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PSYC 3102 Abnormal Psychology Credit Hours: (3)
- PSYC 3103 Child Psychology \*\* Credit Hours: (3)

- PSYC 3106 Social Psychology \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)

# **Pre-Professional Business Administration Minor**

# Requirements

The Fogelman College of Business and Economics offers a pre-professional minor (30 hours) for students whose major is in another college of the University. Requirements are as follows:

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) or
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)

### Note

Accounting, economics, and a minimum of 45 credit hours are prerequisites for 3000 level courses.

# **Professional Selling Minor**

## Requirements

For Students Whose Major Is in Another College of the University (18 hours):

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)

#### 6 Semester Hours Chosen by the Student From the Following Courses:

- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

446

- MKTG 3410 Building Buyer/Seller Relationships Credit Hours: (3)
- MKTG 4470 Essentials of Negotiation \*\* Credit Hours: (3)

### 3 Semester Hours Chosen by the Student From the Following Courses:

- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- MKTG 3320 Retailing Management \*\* Credit Hours: (3)
- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)

# **Project Management Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)
- MIS 4672 Project Management Tools and Leadership \*\* Credit Hours: (3)

### 2 Courses Chosen by the Student From

- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 4160 Mobile Application Development Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- MIS 4845 Application Program Development III Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4481 Teamwork/Group Dynamics in Organizations Credit Hours: (3)
- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

## For Students Whose Major Is Business Information and Technology (12 hours):

• MIS 4672 - Project Management Tools and Leadership \*\* Credit Hours: (3)

### 3 Courses Chosen by the Student From

- MIS 4160 Mobile Application Development Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- MIS 4845 Application Program Development III Credit Hours: (3)
- MGMT 4420 Organizational Behavior in Business \*\* Credit Hours: (3)
- MGMT 4481 Teamwork/Group Dynamics in Organizations Credit Hours: (3)

- MKTG 4080 Marketing Research \*\* Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

For Students Whose Major Is Within Another College of the University (18 hours):

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)
- MIS 4672 Project Management Tools and Leadership \*\* Credit Hours: (3)

# **Psychology Minor**

### Requirements

Completion of 20 semester hours in psychology, including

- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- PSYC 3020 Research and Statistics II \*\* Credit Hours: (4) (or equivalent)
- 9 additional upper-division hours.

# **Public Administration Minor**

The Department of Public and Nonprofit Administration offers a minor in Public Administration with courses that address competencies necessary for work in local government and public agencies. The minor is open to students majoring in any department in the University.

# Requirements

Students must complete 18 hours in Political Science and Public Administration, including 9 hours of required core course and 9 hours from a set of guided electives.

### **Required Courses:**

- POLS 1030 American Government\*\* Credit Hours: (3)
- PADM 3501 Civic Engagement, Voluntarism Credit Hours: (3)
- PADM 3601 Public Admin\*\* Credit Hours: (3)
- PADM 4221 Issues/Urban Admin Credit Hours: (3)

### Guided Electives:

Choose 6 hours from among the following:

- CJUS 4126 CJUS Admin and Mgmt Credit Hours: (3)
- POLS 3211 State/Local Government Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- PADM 4101 Political Statistics Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)

- PADM 4226 Intro Nonprofit Organizations Credit Hours: (3)
- PADM 4231 Admin Internship Credit Hours: (3-12)
- PADM 4401 Comparative Public Adm\*\* Credit Hours: (3)
- PADM 4412 Neighborhood Dev/Social Entrep Credit Hours: (3)
- ANTH 4412 Neighborhood Development Credit Hours: (3)
- PADM 4228 Grant Development/Management Credit Hours: (3)

# **Public Health Minor**

Public Health is the science of protecting the health of people and the communities where they live, learn, work, and play. The Public Health Minor is designed to provide students with an understanding of the connections between public health and every aspect of life as well as the analytic approaches to understanding these connections. The minor can be an asset to students in determining their interest in graduate studies or pursuing public health or other health-related careers. **The Public Health Minor requires a total of 18 hours**.

# Lower Division Core (3 Hours)

Choose one of two options:

- PUBH 1180 Population Health and Society Credit Hours: (3)
- HLSC 2200 Introduction to Public Health & Health Sciences Credit Hours: (3)

# Upper Division Core (9 Hours)

Select any three courses:

- PUBH 3120 Environmental Health 1: Basics & Method Credit Hours: (3)
- PUBH 3130 Introduction to Social Determinants of Health Credit Hours: (3)
- PUBH 3180 Public Health Principles & Practices I Credit Hours: (3)
- PUBH 3150 Analytic and Research Methods in Public Health I Credit Hours: (3)
- PUBH 3710 Public Health Systems & Policy | Credit Hours: (3)

## Electives (6 Hours)

Select two courses from the following:

- ANTH 4511 Medical Anthropology Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- BIOL 4241 Biogeog/GIS Analyses/Ecology Credit Hours: (3)
- COMM 3012 Health Communication \*\* Credit Hours: (3)
- COMM 4015 Health Literacy Credit Hours: (3)
- HLSC 4200 Cultural Competence in Health Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PUBH 3102 Epidemics: The Plague to Ebola Credit Hours: (3)
- SOCI 4442 Sociology of Poverty Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)

# **Public Relations Minor**

To complete the minor in Public Relations, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

### **Public Relations Minor Core**

- JRSM 1750 Precision Language \*\* Credit Hours: (3)
- JRSM 2121 Media Writing \*\* Credit Hours: (3)
- PBRL 3400 Intro to Public Relations Credit Hours: (3)
- PBRL 3421 Public Relations Writing \*\* Credit Hours: (3) Select two of the Following:
- JRSM 3900 Visual Media \*\* Credit Hours: (3)
- JRSM 3905 Graphics for Strategic Media Credit Hours: (3)
- PBRL 4301 Event Planning for PR Credit Hours: (3)
- PBRL 4410 Public Relations Research Credit Hours: (3)
- PBRL 4421 Crisis Comm in Public Relation Credit Hours: (3)
- PBRL 4430 Media Relations Credit Hours: (3)
- PBRL 4431 Music Promo/Public Relations Credit Hours: (3)
- PBRL 4440 Public Relations Campaigns \*\* Credit Hours: (3)

# **Real Estate Minor**

### Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

• FIR 3310 - Real Estate Principles Credit Hours: (3)

Six Additional Hours Chosen From

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)

For Students Whose Major Is Within Another College at the University (21 Hours):

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)

#### Nine Hours Chosen From

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)

# **Religion in Society Minor**

This minor examines the role of religion in society throughout history. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

### Requirements

### Required Courses (6 Hours)

- RLGN 1100 Introduction to Religion \*\* Credit Hours: (3)
- RLGN 3100 Perspectives on Religion Credit Hours: (3)

### Additional Courses (12 Hours)

- ANTH 4253 Anthropology of Religion
- ENGL 4461 Bible as Literature Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- JDST 2850 Religions of Abraham Credit Hours: (3)
- JDST 3661 Perspectives on the Old Testament Credit Hours: (3)
- JDST 4511 Holocaust Studies Credit Hours: (3)
- PHIL 3701 Human and the Divine Credit Hours: (3)
- UNIV 3565 Comparative Christianity\*\* Credit Hours: (3)
- UNIV 3590 New Testament Credit Hours: (3)

# **Religious Studies Minor**

The minor in Religious Studies is designed for students with a diversity of backgrounds and interests in religion. Just as religion in interrelated with many other aspects of society and culture, the minor in Religious Studies will complement coursework and research on religion undertaken in a broad range of disciplines and major departments. The required courses, Introduction to Religion, and Perspectives on Religion, provide students with an appreciation of the variety of phenomena that has characterized the religious experiences and actions of humanity, and with knowledge of the basic approached that have been used to understand such experiences and actions. Elective courses offered in several departments permit the student to develop his or her interest further, by exploring particular religious traditions and ways of studying religion. The Senior Capstone Project integrates previous learning and can be coordinated with work done in the student's major, if desired, through arrangement of an appropriate faculty sponsor.

# Requirements

#### The Minor:

18 semester hours of required courses and electives:

### Lower Division Core (3 hours)

• RLGN 1100 - Introduction to Religion \*\* Credit Hours: (3)

### Upper Division Core (3 hours)

• RLGN 3100 - Perspectives on Religion Credit Hours: (3)

### Senior Capstone Project (3 hours)

• RLGN 4990 - Capstone Project Credit Hours: (3)

### Electives (9 hours)

All courses listed below are 3 hours unless otherwise noted. Other courses, including special topics, individual study, and directed readings courses, may be counted with prior permission of the Program Coordinator.

### Elective Course Listing:

- AAAS 4251 African Religions/Diaspora Credit Hours: (3)
- CLAS 2481 Mythology \*\* Credit Hours: (3)
- ENGL 4461 Bible as Literature Credit Hours: (3)
- HIST 3273 Islamic History to 1405 Credit Hours: (3)
- HIST 3275 History of Jewish People Credit Hours: (3)
- JDST 2850 Religions of Abraham Credit Hours: (3)
- JDST 3601 Judaism Credit Hours: (3)
- JDST 3661 Perspectives on the Old Testament Credit Hours: (3)
- JDST 3801 Ancient & Medieval Jewish Thought Credit Hours: (3)
- JDST 3802 Modern Jewish Thought Credit Hours: (3)
- JDST 4511 Holocaust Studies Credit Hours: (3)
- JDST 4801 Jewish Mysticism Credit Hours: (3)
- PHIL 3701 Human and the Divine Credit Hours: (3)
- PHIL 3702 Philosophy of Religion Credit Hours: (3)
- PHIL 3721 Chinese Philosophy Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- RLGN 4010 Directed Readings Credit Hours: (3)
- RLGN 4050-4075-RLGN 4075 [Inactive]
- SOCI 3860 Sociology of Religion\*\* Credit Hours: (3)
- UNIV 3581 Faith/Reason/Imagination\*\* Credit Hours: (3)
- UNIV 3590 New Testament Credit Hours: (3)
- UNIV 3565 Comparative Christianity\*\* Credit Hours: (3)

# **Risk Management, Financial Planning and Insurance Minor**

### Requirements

For Students Whose Major Is in the Fogelman College of Business and Economics (9 hours):

• FIR 4870 - Risk Management \*\* Credit Hours: (3)

Choose two courses from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3810 Principles of Risk/Insurance Credit Hours: (3)
- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- FIR 4620 Cases in Financial Planning Credit Hours: (3)

For Students Whose Major Is Within Another College at the University (21 hours):

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) or equivalent
- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- FIR 4870 Risk Management \*\* Credit Hours: (3)
- and six additional hours from FIR 1220 or upper division hours in insurance or finance approved by the department chair

# **Social Media Marketing Minor**

### Requirements

For Students Whose Major Is in Another College of the University (18 hours):

- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- MKTG 4611 Social Media Internship/Practicum Credit Hours: (1-6)

#### Plus Any Three of the Following:

- COMM 4811 Media 2.0 Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- MKTG 3012 Consumer Behavior \*\* Credit Hours: (3)
- MKTG 3140 Advertising/Sales Promotion \*\* Credit Hours: (3)
- MIS 4160 Mobile Application Development Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- JRSM 4910 Social Media and Society\*\* Credit Hours: (3)

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

- MKTG 3340 Principles of Social Media Marketing \*\* Credit Hours: (3)
- MKTG 4630 Social Media Strategies and Analytics Credit Hours: (3)
- MKTG 4611 Social Media Internship/Practicum Credit Hours: (1-6)

# **Social Work Minor**

# Requirements

Completion of 21 semester hours in sociology and social work courses including

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- SWRK 2010 Introduction to Social Work\*\* Credit Hours: (3)
- SWRK 2011 Writing for Social Work Credit Hours: (3)
- SWRK 2911 Soc Response to Human Need Credit Hours: (3)
- 9 additional upper division hours in social work courses.

# **Sociology Minor**

# Requirements

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- and 15 upper-division hours in SOCI.

# **Special Events and Catering Management Minor**

In this 18-credit Special Events and Catering Management minor, students will gain a solid understanding of the planning, organizing, and execution of a multitude of special events. Students will gain experiential learning opportunities in all facets of the industry in the new restaurant and special event space at the Kemmons Wilson Culinary Institute. This minor will allow the students to gain specific competencies that are directly related in the very popular and ever-growing special events and catering management industry.

# Required Courses: 18 hours

- HPRM 2003 Special Events Credit Hours: (1)
- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 3050 Food/Beverage Controls Credit Hours: (3)
- HPRM 4021 Banquet and Catering Management Credit Hours: (3)
- HPRM 4022 Special Events Management Capstone Credit Hours: (3)
- HPRM 4301 Event Management for HPRM/PR Credit Hours: (3)
- HPRM 4911 Hospitality Mgmt Internship Credit Hours: (2)

# **Studio Arts Minor**

### Requirements:

Completion of 18 semester hours as follows:

- ART 1311 Drawing | Credit Hours: (3)
- ART 1314 Drawing II Credit Hours: (3)

### Choose one of the following tracks:

#### Ceramics:

- ART 2523 Ceramics | Credit Hours: (3)
- ART 3522 Kilns/Glazes/Tech Skill Credit Hours: (3)
- ART 3524 Ceramics II Credit Hours: (3)
- ART 4521 Ceramics III Credit Hours: (3)

### Painting:

- ART 2331 Painting | Credit Hours: (3)
- ART 3332 Painting II Credit Hours: (3)
- ART 4321 Drawing and Painting | Credit Hours: (3)
- ART 4331 Painting III Credit Hours: (3)

### Printmaking:

- ART 2352 Intro Intaglio/Lithography Credit Hours: (3)
- ART 3351 Intaglio Printmaking Credit Hours: (3)
- ART 3352 Lithography Credit Hours: (3)
- ART 4351 Adv Printmaking I Credit Hours: (3)
   The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### Sculpture:

- ART 2511 Sculpture | Credit Hours: (3)
- ART 3511 Sculpture II Credit Hours: (3)
- ART 3512 Sculpture III Credit Hours: (3)
- ART 4511 Sculpture IV Credit Hours: (3)

# **Supply Chain Management Minor**

# Requirements

For students whose major is in another college of the University (18 hours):

- SCMS 2610 Introduction to Supply Chain Management \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) or equivalent
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

## For students whose major is Marketing Management (9 hours):

Choose any three of the following courses:

- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4511 Supply Chain Strategy Credit Hours: (3)
- SCMS 4512 Current Topics in Supply Chain Management Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)
- SCMS 4810 Problems in Supply Chain Management Credit Hours: (1-6)

# For students whose major is in another department in the Fogelman College of Business and Economics (9 hours):

• SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)

Two of the Following Courses:

- SCMS 4510 Operations Planning and Resources Management Credit Hours: (3)
- SCMS 4620 Logistics Management Credit Hours: (3)
- SCMS 4650 Supply Management Credit Hours: (3)

# **Systems Testing Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

• MIS 2845 - Applied Program Development I \*\* Credit Hours: (3)

- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 4681 Fundamental/Software Testing Credit Hours: (3)
- MIS 4682 Advanced Software Testing Credit Hours: (3)

For Students Whose Major Is Within Another College of the University (18 Hours):

- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- MIS 2845 Applied Program Development I \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 4681 Fundamental/Software Testing Credit Hours: (3)
- MIS 4682 Advanced Software Testing Credit Hours: (3)

# **Theatre Minor**

Any student wishing to minor in a theatre concentration - Performance or Design/Tech - should see the administrative secretary who will assign an advisor. The minor must consist of a minimum of 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor.

# Web Design Minor

# Requirements

Completion of 18 semester hours as follows:

- ART 2223 Computer Assisted Graphc Des Credit Hours: (3)
- ART 2213 Typographic Design | Credit Hours: (3)
- ART 2219 Visual Thinking Credit Hours: (3)
- ART 4500 Web Publishing I: html/CSS Credit Hours:
- ART 4560 Interactive Media Design Credit Hours: (3)
- ART 4224 History Graphic Design Credit Hours: (3)

# Women's and Gender Studies Minor

This minor exposes students to multidisciplinary approaches to the study of the lives of women, with a special focus upon their racial diversity. Students therefore take courses from both the humanities and social sciences, and study issues of racial diversity as well as gender.

# Requirements

### The Minor

18 semester hours, 9 hours from the core and 9 hours from the list of approved electives.

### Core (9 hours)

or

- HIST 4853 African American Women Credit Hours: (3)
- SOCI 4460 Black/White Women in South Credit Hours: (3)
- PSYC 3236 Psychology of Gender Credit Hours: (3)

- PHIL 3452 Feminist Theory Credit Hours: (3)
- WMST 2100 Intr/Women/Gender Study \*\* Credit Hours: (3)

### Electives (9 hours)

Select one course from each of the following groups:

#### Women's Issues Across Time and Place:

- ANTH 3511 Culture/Kin/Family Credit Hours: (3)
- ANTH 4551 Culture/Sex/Childbirth Credit Hours: (3)
- CJUS 4460 Race, Ethnicity and Justice in America Credit Hours: (3)
- HIST 4213 Women/Gender/Latin America Credit Hours: (3)
- HIST 4289 African Women's History Credit Hours: (3)
- HIST 4831 History American Family \*\* Credit Hours: (3)
- HIST 4851 History of Women in America \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)

#### Cultural Studies:

- COMM 4364 Gendered Public Discourse Credit Hours: (3)
- COMM 4373 Interracial Communication\*\* Credit Hours: (3)
- COMM 4856 Gender and Film Credit Hours: (3)
- ENGL 3325 Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3)
- ENGL 3326 Af/Am Lit since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4372 Af/Am Author/Harlem Ren \*\* Credit Hours: (3)
- ENGL 4373 Af/Am Author since Harlem Ren \*\* Credit Hours: (3)
- ENGL 4451 Studies/Women and Literature \*\* Credit Hours: (3)
- SLS 4125 Gender/Race/Class Urb Sp/Lei \*\* Credit Hours: (3)

#### Diversity Among Women:

- HIST 3881 African American History \*\* Credit Hours: (3)
- HIST 4289 African Women's History Credit Hours: (3)
- HIST 4853 African American Women Credit Hours: (3) (if not used to fulfill Core Requirement)
- HIST 4882 Civil Rights Movement Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3420 Sociology of the South Credit Hours: (3)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- PSYC 3236 Psychology of Gender Credit Hours: (3) (if not used to fulfill Core Requirement)

#### Note

With approval from the Director of Women's and Gender Studies, a special topics course may be substituted for an elective in each group.

### **World Languages and Literatures Minor**

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Completion of 18 semester hours consisting of (1) courses numbered 1020, 2010, and 2020 (or their equivalents) in the foreign language in which upper division hours are to be taken, and (2) 9 upper division semester hours in one of the following languages: Chinese, French, German, Italian, Japanese, Russian, or Spanish. Students placing directly into 2010 or higher on the Foreign Language placement exam may complete the requirements for the minor by either: (1) applying for retroactive credit for 1020 and any subsequent courses out of which they have placed; or (2) completing additional upper-division hours to bring the total number of hours for the minor to 18.

# **Accelerated Programs**

# Advertising-Journalism and Strategic Media (Accelerated BA/MA)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year. Students interested in the ABM program should talk with their adviser as early in their studies as possible and <u>apply before they have</u> completed 90 credit hours. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

- 1. Student fills out department's online application.
- 2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.
- 3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

# Anthropology, (Accelerated B.A./M.A.)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Anthropology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Anthropology. Working with the undergraduate coordinator, those selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree requirements while also beginning their M.A. coursework.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Department of Anthropology. Each applicant will complete an interview with the graduate academic committee in the department. Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in anthropology. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Department of Anthropology's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# University General Education Program (41 hours)

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in anthropology courses including

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ANTH 3200 Culture and Change around the World Credit Hours: (3)
- ANTH 4065 Anthropological Theory Credit Hours: (3)
- and 18 additional semester hours with at least 15 hours at the upper division level.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Honors Program in Anthropology is open to anthropology majors only and requires (a) an inclusive grade point average of at least 3.00, (b) a cumulative grade point average of at least 3.25 in the major, (c) the completion of ANTH 4010 Ethnographic Methods; (d) four honors courses in anthropology; (e) the completion of independent research (traditional or engaged scholarship) culminating in an original research thesis or creative work. Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred, "With Honors in Anthropology." Moreover, the student's diploma and the record at the University of Memphis will reflect this accomplishment. Admission to the Honors Program in Anthropology requires the completion of an application in which students must identify their specific research interests. See departmental advisor for more details.

# Typical 5 Year Accelerated Anthropology Sequence

# Freshman Year

#### First Semester

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Math\*
- Foreign Language/BA
- Elective

#### Second Semester

- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective Credits (3)
- Foreign Language/BA
- Humanities/Fine Arts\*
- Semester Totals 30-31 hrs.

# Sophomore Year

#### First Semester

• ANTH 3200 - Culture and Change around the World Credit Hours: (3)

or

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science\* (3)
- History\*
- Elective(3)

(16 hours this semester)

#### Second Semester

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- History\*
- Elective
- Fine Arts\*
- Natural Science\*
- UD Elective

(18 hours this semester)

Semester Totals 34 hrs.

### Junior Year

#### **First Semester**

- UD ANTH (3)
- Elective (3)
- Elective (3)
- UD Elective (3)
- UD ANTH (3)

#### Second Semester

- ANTH 4065 Anthropological Theory (3)
- UD ANTH (3)
- UD Elective (3)
- Elective Credits (3)
- Elective Credits (3)
- Elective Credits (2)

Semester Totals 32 hrs

### Senior Year

#### **First Semester**

- UD ANTH (3)
- UD Elective (3)
- ANTH 7075 (3)
- ANTH 7985 (1)
- Elective (3)
- Grad Elective (3)

#### Second Semester

- UD ANTH (3)
- ANTH Elective (3)
- UD Elective (3)
- ANTH 7076 (3)

(24 for the BA degree, 13 hours MA level; 17 BA level)

### 5th Year MA Program

#### **First Semester**

- ANTH 7200 (3)
- Grad Elective (3)
- Grad Elective (3)
- Grad Elective (3)

#### Second Semester

- ANTH 7255 (3)
- ANTH 7985 (5)

• Grad Elective (3) Semester Totals 23 hrs.

Total Hours Undergraduate: 123-124 Total Hours Required for Graduation: 120 Total Hours Graduate: 36

# **Biology**, (Accelerated B.S./M.S.)

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Biology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Biological Sciences.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Biology department. Each applicant will complete an interview with the graduate academic coordinator in biology.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in biology. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the Biological Sciences department's M.S. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: Biology majors are also required to take either MATH 1830 or MATH 1910 and these courses will fulfill general education requirements.

Eight credit hours of natural science courses (two lectures with labs) are required for general education and can be fulfilled by the following courses that are required for the Biology major.

- BIOL 1110 General Biology I
- BIOL 1111 General Biology I Lab
- BIOL 1120 General Biology II

461

# The Major (67-68 hours)

# Biology Requirements (18 hours):

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3) (fulfills general education requirements)
- BIOL 1121 General Biol II Lab Credit Hours: (1) (fulfills general education requirements)
- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 4100 Evolution Credit Hours: (3)

### Additional Science and Math Requirements (27-28 hours):

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3) (fulfills general education requirements) or
- MATH 1910 Calculus I \*\* Credit Hours: (4) (fulfills general education requirements)
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab I Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

or

- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

18 Additional Upper Division Hours in BIOL Courses Approved by the Department Including One Organismal Diversity Course From Among:

- BIOL 3050 Ecology Credit Hours: (4)
- BIOL 3200 General Botany Credit Hours: (4)
- BIOL 3620 Comp Anatomy of Vertebrts Credit Hours: (5)
- BIOL 4245 Plant Systematics/Evolution Credit Hours: (4)
- BIOL 4375 Molec Biol/Parasite Credit Hours: (4)
- BIOL 4640 Ornithology Credit Hours: (4)
- BIOL 4740 Mammalogy Credit Hours: (4)
- BIOL 4744 Herpetology Credit Hours: (4)
- BIOL 4900 Entomology Credit Hours: (4)

### **Required Support Courses:**

Select courses from each of the following three areas for a total of 12 hours:

Science Ethics (one course):

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

Upper Division Social Science (one course):

- ANTH 3111 Human Paleontology Credit Hours: (3)
- ANTH 4111 Evolution and Human Health Credit Hours: (3)
- ANTH 4511 Medical Anthropology Credit Hours: (3)
- ANTH 4521 Culture, Soc & Mental Health Credit Hours: (3)
- ANTH 4531 Alcohol/Drugs/Culture Credit Hours: (3)
- ANTH 4551 Culture/Sex/Childbirth Credit Hours: (3)
- ANTH 4571 Race and Health Disparities Credit Hours: (3)
- ECON 4740 Health Care Economics Credit Hours: (3)
- ESCI 4201 Urbanization/Environment Credit Hours: (3)
- ESCI 4251 Environmental Hazards Credit Hours: (3)
- ESCI 4252 Global Environmental Change Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- PSYC 3306 Physiological Psyc\*\* Credit Hours: (3)
- PSYC 3307 Animal Behavior \*\* Credit Hours: (3)
- PSYC 3507 Alcohol/Drugs/Behavior \*\* Credit Hours: (4)
- PSYC 3512 Health Psychology \*\* Credit Hours: (4)
- PSYC 4305 Mind/Brain/Intelligence \*\* Credit Hours: (3)
- SOCI 3401 Social Inequality \*\* Credit Hours: (3)
- SOCI 3432 Sociology of Gender \*\* Credit Hours: (3)
- SOCI 4420 Racial Inequality Credit Hours: (3)
- SOCI 4541 Sociology of Aging Credit Hours: (3)
- SOCI 4851 Medical Sociology Credit Hours: (3)

Skills Courses (two courses):

- CLAS 3021 Medical Terminology Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4) or
- COMP 4001 Intro to Python Programming Credit Hours: (3)
- ENGL 3601 Technical and Profess Writing \*\* Credit Hours: (3)
- ESCI 4511 Remote Sensing/Environ Credit Hours: (3)
- ESCI 4515 Geographic Info Science Credit Hours: (3)
- HLSC 4530 Epidemiology \*\* Credit Hours: (3)
- MATH 4611 Intro Applied Statistics Credit Hours: (3) or
- PSYC 3010 Research and Statistics I \*\* Credit Hours: (4)
- PSYC 3020 Research and Statistics II \*\* Credit Hours: (4)
- or

• Foreign Language: 6 hours in a single foreign language, or equivalent. If the language chosen was used to meet University admissions requirements, students must take the foreign language placement exam and complete two sequential courses beginning with the course into which placed by the exam. If a different language is chosen, any six hours will fulfill the requirement.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# NOTES:

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the major, the minor, and in all required chemistry, physics, and mathematical courses. BIOL, CHEM, MATH, and PHYS courses applicable toward the major or minor may not be taken more than three times.

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements.

# Typical 5-Year Accelerated B.S./M.S. Program in Biology

## Freshman Year

#### **First Semester**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3) OR
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Gen Ed Humanities (3)
- Gen Ed Social Science \* (3)

Semester Total 16-17 hrs

#### Second Semester

- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology | Lab Credit Hours: (1)
- Gen Ed Social Science (3)
- Gen Ed Humanities (3)

Semester Total 17 hrs

### Sophomore Year

#### **First Semester**

- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Gen Ed History (3)
- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab I Credit Hours: (1)

Semester Totals 18 hrs.

#### Second Semester

- BIOL 3130 Cell Biology Credit Hours: (3)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)

• ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Gen Ed History (3)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)
- Semester Total 17 hrs

### Junior Year

#### **First Semester**

- BIOL 4000 Research | Credit Hours: (1-3)
- BIOL 4511 BIOCHEMISTRY | Credit Hours: (3)
- Elective (3)
- UD Social Science (3)
- Skills Course (3-4)
- BIOL 4503 Lab Tech In Biochem Credit Hours: (2)
- Semester Total 15-18 hrs

#### Second Semester

- BIOL 4512 Biochemistry II Credit Hours: (3)
- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3500 Micro I/Fundmntl Aspect Credit Hours: (3)
- BIOL 3505 Gen Microbiology Lab Credit Hours: (2)
- UD Statistics as Skills Course (3-4)
- Elective/BIOL 4001 (3)

Semester Totals 16-17 hrs.

### Senior Year

#### First Semester

- BIOL 4100 Evolution Credit Hours: (3)
- Science Ethics (3)
- Grad Courses 7000 (2), 7092, ... (6)

Semester Totals 12 hrs.

#### Second Semester

• Electives (6)

# Grad Year

#### First Semester

- BIOL 7200 Seminar (1)
- BIOL 7996 Thesis (3)
- Grad Electives (6)
- BIOL 7092 Research (2)
- Semester Totals 12 hrs.

#### Second Semester

- BIOL 7600 Defense (1)
- BIOL 7996 Thesis (3)
- Grad Electives (6)
- BIOL 7092 Research (2)
- Semester Totals 12 hrs.

# Total hours for completion of B.S./M.S. (147-152)

\*Must satisfy University General Education Program Requirement.

\*\*Courses offered only online or both online and on-ground

# **Business Economics, (Accelerated B.B.A./M.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3) Take either:
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR

• MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:

- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

### The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

#### For students choosing the Business Economics major with no concentration:

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- six upper-division economics courses (18 hours) selected with the approval of the department advisor.

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

### Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Accelerated B.B.A./M.A. Program in Economics

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Economics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Economics.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.00 grade point average, and must submit two reference letters and a copy of their transcript to the Economics department. Each applicant will complete an interview with the graduate academic coordinator in economics.

Students must also apply to the Graduate School for the accelerated B.B.A./M.A. program, which allows them to take graduate courses in economics. To continue in the program past the B.B.A., students must apply for full admission into the Graduate School and into the Economics department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Typical 4-Year Business Economics Sequence

# Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)

• SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR

• MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)

#### or

• ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

#### Elective (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)

- Natural Science (4) \*
- History (3) \*
- Humanities/Fine Arts (3) \*
- Elective (3)

Semester Totals 32 hrs

#### Junior Year

- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- ECON elective (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- ECON elective (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

## Senior Year

- ECON elective (3)
- ECON elective (3)
- Elective (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- ECON elective (3)
- ECON elective (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- History (3) \*

Semester Totals 30 hrs

## Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Business Information & Technology (Accelerated B.B.A./M.S.)**

This program permits outstanding undergraduate majors in Business Information & Technology to begin coursework for the Masters of Science in Information Systems during their senior year. Students interested in the accelerated program are encouraged to begin planning for it early in their undergraduate careers, in consultation with both their undergraduate B.B.A. advisor and the M.S.I.S. advisor of the Department of Business Information & Technology.

To be accepted into the Accelerated B.B.A./ M.S. Program, student must have a grade point average of at least 3.00, and must submit two letters of reference and a copy of their transcript to the Department of Business Information & Technology. Each applicant will also complete an interview with the M.S. advisor of the Department.

470

After being accepted into the program, the student will work closely with his or her undergraduate advisor and master's advisor in order to develop a carefully tailored program of student so that he or she can begin work on the M.S. as they complete the B.B.A.

Students must apply to the ABM program. To continue the Program once they have completed the B.B.A., students must apply for full admission into the Graduate School and into the M.S. Program in Information Systems.

Up to 9 hours of graduate coursework may be applied to both the B.B.A. in BIT and the M.S.I.S. degrees.

Core:

MIS 7605 (3775)

MIS 7650 (4310)

MIS 7610 (3770)

Electives:

MIS 7435 (4760)

MIS 6672 (4672)

MIS 6681 (4681)

MIS 6682 (4682)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)

• MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:

- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:

#### • MATH 1710 - College Algebra Credit Hours: (3)

• MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- MATH 1421 Honors Calculus | Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- Choose one of the following international business electives:
- ACCT 4625 InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
- ECON 4350 International Econ Credit Hours: (3)
- ECON 4351 International Monetary Theory/Policy Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- MGMT 4510 International Business Communication \*\* Credit Hours: (3)
- MGMT 4810 International Management \*\* Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MKTG 4530 International Marketing \*\* Credit Hours: (3)

## C. The Major (27 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

Completion of a minimum of 27 hours, including

- MIS 2845 Applied Program Development I \*\* Credit Hours: (3)
- MIS 3770 System Analysis Methods \*\* Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)
- MIS 3790 Enterprise Architecture \*\* Credit Hours: (3)
- MIS 3885 Strategic IT Project Management \*\* Credit Hours: (3)
- MIS 4800 Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

#### Major electives

The additional nine hours will be satisfied by three of the following:

- MIS 4160 Mobile Application Development Credit Hours: (3)
- MIS 4310 Global Information Technology \*\* Credit Hours: (3)
- MIS 4321 Global Outsourcing/Technology Credit Hours: (3)
- MIS 4672 Project Management Tools and Leadership \*\* Credit Hours: (3)
- MIS 4681 Fundamental/Software Testing Credit Hours: (3)
- MIS 4682 Advanced Software Testing Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- MIS 4845 Application Program Development III Credit Hours: (3)

## D. Electives (10 hours)

## Chemistry, (Accelerated B.S./M.S.)

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Chemistry during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Chemistry.

Working with the undergraduate and graduate coordinators, those selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree requirements while also beginning their coursework their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Chemistry department. Each applicant will complete an interview with the graduate academic committee in Chemistry.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in Chemistry. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the Department of Chemistry's M.S. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Chemistry, B.S. Major:

### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

The Major (46-47 hours)

## **General Education (12 hours)**

#### Mathematics:

- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Natural Science:
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### Core Requirements (31 hours):

- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
   The online catalog can be accessed at: http://catalog.memphis.edu/index.php

- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- CHEM 4999 Senior Survey Credit Hours: (1)
- PHYS 2110 Physics for Scientists and Engineers | Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)

or

- PHYS 2010 General Physics | Credit Hours: (3)
- PHYS 2011 General Physics Lab | Credit Hours: (1)
- PHYS 2020 General Physics II Credit Hours: (3)
- PHYS 2021 General Physics Lab II Credit Hours: (1)

#### Plus One of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

## General Concentration (15-16 hours)

Choose eight (8) upper division semester hours in chemistry from the following (not to include more than three credit hours of experiential learning):

- CHEM 4901 Chemical Research | Credit Hours: (1)
- CHEM 4902 Chemical Research II Credit Hours: (1)
- CHEM 4903 Chemical Research III Credit Hours: (1)
- CHEM 4916 Teaching Chemistry Credit Hours: (1-3)

#### and

• MATH 1920 - Calculus II\*\* Credit Hours: (4)

- Plus one of the Following Courses:
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- MATH 4611 Intro Applied Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)

## NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grade of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry Department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

## Electives

Electives must be chosen to bring the total number of hours to 120.

## Graduating with Honors in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- The student must present his/her research to an audience external to the Department of Chemistry.

## Typical 5-Year Chemistry (B.S./M.S.) Sequence, General Concentration

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Humanities/Fine Arts \* (3)
- ACAD 1100 Academic Strategies Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- Social/Behavioral Sci\* (3)

Semester Totals 31 hrs

#### Sophomore Year

- CHEM 3301 Foundations/Organic Chem Lab Credit Hours: (1)
- CHEM 3310 Foundations/Organic Chemistry Credit Hours: (3)
- Humanities/Fine Arts \* (3)
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab | Credit Hours: (1) PS
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- CHEM 3501 Foundation/Bioorganic Chem Lab Credit Hours: (1)
- CHEM 3511 Foundations/Bioorganic CHEM Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)

or

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3) PS
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- Social/Behavioral Sci\* (3)
- Elective (3)

#### Semester Totals: 31 hrs

#### Junior Year

- CHEM 3201 Foundation/Analytical CHEM lab Credit Hours: (2)
- CHEM 3211 Foundations/Analytical CHEM Credit Hours: (3)
- MATH (3) (select from: MATH 2110, MATH 4611 OR COMP 1900)
- History\* (3)
- Elective (3)
- CHEM 3111 Foundations/Inorganic CHEM Credit Hours: (3)
- PHIL 351X (select from: PHIL 3512, 3514 OR 3515)

- History\* (3)
- CHEM 3411 Foundations/Physical Chemistry Credit Hours: (3)
- Elective (3)
- Semester Totals 29 hrs

#### Senior Year

- CHEM 6211 (3)
- CHEM 6311 (3)
- Elective (3)
- Elective (2)
- UD Elective (3)
- UD CHEM (4)
- CHEM 4999 Senior Survey Credit Hours: (1)
- CHEM 8000 Elective (3)
- CHEM 8000 Elective (3)
- UD Elective (3)
- UD Elective (3)
- Elective (3)

Semester Totals: 32 hrs

#### 5th Year M.S. Program

- CHEM 6000 elective (3)
- CHEM 8000 elective (3)
- CHEM 8913 (1)
- CHEM 7911 (1)
- CHEM 8910(1)

Semester Totals 18 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

## Total Hours Graduate Program: 30

## Total Hours Required for M.S.: 30

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011 and PHYS 2020/PHYS 2021 may be substituted for this sequence.

## Communication, Accelerated B.A./M.A.

Accelerated B.A./M.A Program in CommunicationThis program allows outstanding undergraduates to begin the coursework for the Master of Arts in Communication during their senior year. Students must begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Communication.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students should have a minimum 3.25 grade point average, and must submit a copy of their transcript and two reference letters from Department of Communication faculty to the Department chair. Each applicant will complete an interview with the undergraduate and graduate studies coordinator.

476

Students must also apply to the Graduate School for "combination senior" status, which allows them to take graduate courses in Communication. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Communication department's M.A. program.

Up to 9 hours of graduate course work may be applied to both the undergraduate and graduate programs.

## Computer Science, (Accelerated B.S./M.S.)

This 5-year program allows Computer Science majors begin the coursework for the M.S. degree early, counting up to 12 semester hours toward both B.S. and M.S. degrees.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

## The Major (63 hours)

#### **General Education (12 hours)**

```
Mathematics:
• MATH 1910 - Calculus I ** Credit Hours: (4)
Natural Science:
• PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3)
• PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)
and
• PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

    PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

or
• CHEM 1110 - General Chemistry | Credit Hours: (3)
• CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
and
• CHEM 1120 - General Chemistry II Credit Hours: (3)
• CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
or
• BIOL 1110 - General Biology | Credit Hours: (3)
• BIOL 1111 - General Biology | Lab Credit Hours: (1)
and
• BIOL 1120 - General Biology II Credit Hours: (3)
• BIOL 1121 - General Biol II Lab Credit Hours: (1)
Core Requirement (51 hours)
```

In addition to the specific General Education courses listed above, majors are required to take the following courses:

- MATH 1920 Calculus II\*\* Credit Hours: (4)
- MATH 3242 Intro Linear Algebra Credit Hours: (3)

- MATH 4614 Probability/Statistics Credit Hours: (3)
- COMP 1900 CS1:Intro Comp Science Credit Hours: (4)
- COMP 1950 Ethics and Technology Credit Hours: (1)
- COMP 2150 CS2: OOP and Data Structures Credit Hours: (4)
- COMP 2700 Discrete Structures Credit Hours: (4)
- COMP 3115 Database Process and Design Credit Hours: (3)
- COMP 3410 Computer Org/Architecture Credit Hours: (4)
- COMP 3825 Network/Info Assurance Credit Hours: (3)
- COMP 4030 Design/Analysis Algorithms Credit Hours: (3)
- COMP 4040 Programming Languages Credit Hours: (3)
- COMP 4081 Software Engineering Credit Hours: (3)
- COMP 4270 Operating Systems Credit Hours: (3)
- COMP 4601 Models of Computation Credit Hours: (3)
- COMP 4882 Capstone Software Proj Credit Hours: (3)

## Concentration (12 hours)

Select Computer Science, General Concentration (B.S.), Computer Science, Artificial Intelligence Concentration (B.S.), Computer Science, Data Science Concentration (B.S.) or Computer Science, Cybersecurity Concentration (B.S.)

## Enrollment

Students who are within two semesters of earning the B.S. degree in Computer Science and have maintained an overall and COMP GPA of at least 3.0 may officially enroll in the program.

## B.S. degree requirement

Students must satisfy the University General Education Program and The Major requirements as described above, with the graduate course substitutions detailed in part (1) of the M.S. degree requirement below.

After enrolled students earn the Computer Science, General Concentration (B.S.), Computer Science, Artificial Intelligence Concentration (B.S.), Computer Science, Data Science Concentration (B.S.) or Computer Science, Cybersecurity Concentration (B.S.), they must apply for full admission into the Graduate School and into the Master's Program in Computer Science. The GRE requirement will be waived for students who have maintained an overall and COMP GPA of at least 3.0 at the time of earning the B.S. degree.

## M.S. degree requirement

**1.** Complete 12 hours of graduate-level COMP courses to substitute for certain 3000/4000-level courses that are required by the COMP major. These 12 hours are counted toward both the B.S. and M.S. degrees.

At most 6 hours of these can be 6000-level courses. COMP 6001, 6005, 6014, 6030, 6040, 6270, 6601, 6901, and 6911 cannot be used for these 6 hours.

At least 6 hours of these must be 7000-level courses. Allowable substitutions are: COMP 7712 for 4030; 7212 for 4270; 7612 for 4601; 7327 for 4420; 7125 for 4430; 7720 for 4720; 7745 for 4745. Furthermore, any 7000-level course can substitute for a COMP elective.

**2.** Complete 21 semester hours of 7000-level courses, which must include at least 3 hours of COMP 7980 (Master's Project) or 7996 (Master's Thesis).

## Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

## **Computer Science Honors Designation**

A student will earn the designation "with Honors in Computer Science" upon graduation having complied with the following requirements:

- Be admitted into the Computer Science Honors Program by the Department upon formal request for consideration by the student;
- Have a cumulative GPA of at least 3.0 and a GPA of at least 3.60 in Computer Science (COMP) courses satisfying degree requirements;
- Complete fifteen (15) credit hours in courses designated "Honors" in the the Computer Science program and satisfying degree requirements;
- Take honors sections of both COMP 1900 and COMP 2150 (core sequence);

• Take at least three (3) credit hours from the following courses as honors sections: COMP 4882 Capstone Project, COMP 4901 Independent Study, COMP 4980 Senior Thesis.

## Total hours required for completion of the B.S. (120)

## Fifth Year (for Accelerated B.S./M.S.)

#### First Semester

- COMP 7xxx (3)
- COMP 7xxx (3)
- COMP 7xxx (3)

• COMP 7xxx (3) Total hours 12

#### Second Semester

- COMP 7980 (6)<sup>MP</sup>
- COMP 7xxx (3)
- COMP 7xxx (3)

#### Total hours 12

<sup>MP</sup>Accelerated B.S./M.S. students have up to 6 semesters to complete COMP 7980 (Masters Project), after the Senior Year. In each semester, they must register for COMP 7980 for either 1 hour, 3 hours, or 6 hours.

## Total hours for completion of B.S./M.S. (141)

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

## Economics, (Accelerated B.A./M.A.)

Program objectives can be found in the Business Economics major in the Fogelman College of Business and Economics section.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (30 hours)

Completion of 30 semester hours, including

- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- ECON 3320 Intermediate Macroeconomic Theory Credit Hours: (3)
- 18 additional upper division semester hours in economics courses as approved by the department advisor.

### Electives

Electives may be chosen to bring the total number of hours to 120.

### Honors Program

To be considered eligible for the Honors Degree Program in Economics, the student must:

- Maintain a minimum grade of B in honors sections of both ECON (TNe) 2010 Intro to Macroeconomics\*\* and ECON 2020 Intro to Microeconomics\*\*.
- Obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must

- Maintain an average GPA of 3.25 in all economics courses to continue in the program.
- Have a minimum GPA of 3.5 in all economics courses at graduation.
- Enroll in ECON 3310 Intermediate Microeconomic Theory and ECON 3320 Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course.

• Write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

#### Accelerated B.A./M.A. Program in Economics

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Economics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Economics.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Economics department. Each applicant will complete an interview with the graduate academic coordinator in economics.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in economics. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Economics department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## Typical 4-Year Economics Sequence

### **Freshman Year**

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3-4)
- Humanities/Fine Arts\* (3)
- Elective (3)
- Foreign Language/B.A. (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- Fine Arts\* (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Foreign Language/B.A. (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Natural Science\* (4)
- Elective (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- History\* (3)
- History\* (3)
- Elective (3)
- Natural Science\* (4)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- UD elective (3)
- UD elective (3)
- UD elective (3)
- UD ECON elective (3)
- ECON 3310 Intermediate Microeconomic Theory Credit Hours: (3)
- UD elective (3)
- UD elective (3)
- Elective (3)

• ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)

481

• UD ECON elective (3)

#### Semester Totals 30 hrs

#### Senior Year

- Elective (3)
- UD ECON (3)
- UD ECON (3)
- UD ECON (3)
- UD ECON (3)
- UD Elective (3)
- Elective (3)
- Elective (4)
- Elective (3)

Semester Totals 28 hrs

Total Hours: 120-121

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## English, (Accelerated B.A./M.A)

This program allows outstanding undergraduate students to begin coursework for the Master of Arts in English during their senior year. Working with the Undergraduate Advisor and the Director of Graduate Studies, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit one reference letter to the English department. The letter should emphasize the student's ability to be successful in graduate-level coursework. Each applicant will complete an interview with the Director of Graduate Studies in English.

In the ABM Program, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Graduate coursework will not apply to undergraduate GPA.

To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the English department's M.A. program.

Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of English.

To get additional details about this program, consult the department advisor.

# **Finance major and Finance major with Real Estate Concentration** (Accelerated **B.B.A/M.S**)

#### <sup>482</sup> University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)

## Finance major

Choose 1 or more courses from the following:

- FIR 4011 Retirement and Estate Planning Credit Hours: (3)
- FIR 4550 International Finance \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- FIR 4721 Fixed Income and Derivatives Credit Hours: (3)

Choose 1 or more courses from the following:

- FIR 4610 Cases Managerial Finance \*\* Credit Hours: (3)
- FIR 4620 Cases in Financial Planning Credit Hours: (3)
- FIR 4730 Financial Analysis/Certification \*\* Credit Hours: (3)

Choose courses (up to 4) from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 3810 Principles of Risk/Insurance Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4331 Stock Portfolio Mgmt Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4770 Security Analysis/Portfolio Management Credit Hours: (3)
- FIR 4870 Risk Management \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)
- ACCT 3510 Federal Income Tax I \*\* Credit Hours: (3)
- ECON 3610 Money and Banking Credit Hours: (3)
- ECON 4120 Economic Forecasting Credit Hours: (3)
- MIS 3775 Database/Information Management \*\* Credit Hours: (3)

## Real Estate concentration (18 hours):

- FIR 3310 Real Estate Principles Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)

Choose 3 courses from the following:

- FIR 1220 Personal Financial Management Credit Hours: (3)
- FIR 4310 Real Estate Law \*\* Credit Hours: (3)
- FIR 4340 Real Estate Appraisal \*\* Credit Hours: (3)
- FIR 4440 Intermediate Managerial Finance \*\* Credit Hours: (3)
- FIR 4710 Commercial Banking \*\* Credit Hours: (3)
- FIR 4720 Management of Financial Institutions \*\* Credit Hours: (3)
- FIR 4911 Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)
- ESCI 4515 Geographic Info Science Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Accelerated B.B.A./M.S. in Finance with a major in finance or a finance major with a concentration in Real Estate

This program allows outstanding undergraduates to begin taking graduate courses during their senior year. These students demonstrate that they seek to challenge themselves, which makes them stand out to graduate schools and prospective employers.

In this program students can complete a B.B.A. degree and AT THE SAME TIME complete graduate-level courses that can count toward a M.S. Up to12 hours of graduate course work may be applied to BOTH the undergraduate and graduate programs and this double counting is only available in ABM programs.

Students are encouraged to contact both the undergraduate and graduate academic coordinators early so that they can begin to plan their course of study. To apply, students must have a minimum 3.25 GPA and submit two reference letters and a copy of their transcript to the Department of Finance, Insurance and Real Estate. Each applicant must complete an interview with the graduate academic coordinator in finance, insurance and real estate.

Students must also apply to the Graduate School for the accelerated B.B.A./M.S. program, which allows them to take graduate courses in finance, insurance and real estate.

Continuation in the program beyond the B.B.A. in NOT required. Students wishing to continue past the B.B.A. must apply for full admission into the Graduate School and into the Finance, Insurance and Real Estate Department's M.S. program.

Any graduate coursework will not apply to the undergraduate GPA.

## Typical 4-Year Finance Major Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*

- FIR 1220 Personal Financial Management Credit Hours: (3) or
- Elective (1-3)
- MATH 1710 College Algebra Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

Elective (3)

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3) \*
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science (4) \*

or

- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- Natural Science (4) \*
- History (3) \*
- Elective (3)
- Humanities/Fine Arts (3) \*

#### Semester Totals 32 hrs

#### Junior Year

- FIR 3410 Financial Management \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- FIR elective (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)

Semester Totals 30 hrs

#### Senior Year

- FIR 4011 or FIR 4550 or FIR 4710 or FIR 4720 or FIR 4721 (3)
- FIR elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- Elective (3)
- FIR elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)
- FIR 4610 or FIR 4620 or FIR 4720 (3)
- International Business elective (3)
- FIR elective (3)

#### Semester Totals 30 hrs

### Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Typical 4-Year Real Estate Concentration Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- Humanities/Fine Arts (3) \*
- FIR 1220 Personal Financial Management Credit Hours: (3) or
- Elective (3)
- MATH 1710 College Algebra Credit Hours: (3)
- MIS 2749 Foundation/Information Systems \*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- History (3) \*
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)

Humanities/Fine Arts (3) \*

- SCMS 2710 Business Analytics -Statistics \*\* Credit Hours: (3) OR
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

- ACCT 2010 Fundamentals of Acct I \*\* Credit Hours: (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3) \*

or

• ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

- Natural Science (4) \* Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- ACCT 2020 Fundamentals of Acct II \*\* Credit Hours: (3)
- History (3) \*
- Natural Science (4) \*
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- Elective (1-3)

#### Semester Totals 30-32 hrs

#### Junior Year

- FIR 3410 Financial Management \*\* Credit Hours: (3)
- ACCT 3130 Legal/Social/Political Environ \*\* Credit Hours: (3)
- SCMS 3711 Business Analytics Tools \*\* Credit Hours: (3)
- MIS 3210 Critical Thinking Using Analytics \*\* Credit Hours: (3)
- MGMT 3110 Organization and Mgmt \*\* Credit Hours: (3)
- FIR elective (3)
- FIR 3720 Financial Markets \*\* Credit Hours: (3)
- SCMS 3510 Operations Management \*\* Credit Hours: (3)
- MGMT 3510 Business Communications \*\* Credit Hours: (3)
- FIR 3310 Real Estate Principles Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

- FIR 3710 Investments \*\* Credit Hours: (3)
- FIR 4320 Real Estate Finance \*\* Credit Hours: (3)
- FIR elective (3)
- FIR elective (3)
- Elective (3)
- MKTG 3010 Principles of Marketing \*\* Credit Hours: (3)
- FIR 4350 Real Estate Investment \*\* Credit Hours: (3)
- Intl Business elective (3)
- MGMT 4710 Strategic Management \*\* Credit Hours: (3)
- Elective (3)

Semester Totals 30 hrs

Total Hours: 120-122

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Dietetics Concentration - M.S. Nutrition - Clinical Nutrition Concentration, (Accelerated B.S./M.S.)

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/ MS, Nutrition (NUTR) with a concentration in Clinical Nutrition (CLNN). The Accelerated Bachelor's/Master's (ABM) degree program HS DIET/ NUTR (CLNN) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in CLNN that may satisfy some of its degree requirements.

487

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/Dietetics bachelor's and NUTR/ CLNN master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

- Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;
- Have a UM GPA of 3.25 or better
- Be within 40 semester hours of graduation

• Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;

• Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and

• Apply for admission to the ABM Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

## Nutrition with a concentration in Clinical Nutrition:

- NUTR 6010 Management and Food Systems
- NUTR 7412 Cellular Nutrition I
- NUTR 7422 Cellular Nutrition II
- HPRO 7780 Health Counseling

# Health Studies - Dietetics Concentration - M.S. Nutrition -Environmental Nutrition Concentration, (Accelerated B.S./M.S.)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences:

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/ MS, Nutrition (NUTR) with a concentration in Environmental Nutrition (ENVN)The Accelerated Bachelor's/Master's (ABM) degree program HS (DIET)/ NUTR (ENVN) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in ENVN that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/DIET bachelor's and NUTR/ENVN master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

- Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;
- Have a UM GPA of 3.25 or better
- Be within 40 semester hours of graduation
- Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;
- Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and
- Apply for admission to the ABM Degree Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

## Nutrition with a concentration in Environmental Nutrition:

- NUTR 7182 Environmental Nutrition
- NUTR 7712 Cultural Foods and Nutrition
- HMSE 7010 Research Methods in Health Studies
- HPRO 7780 Health Counseling

# Health Studies - Dietetics Concentration - M.S. Nutrition - Nutrition Science, (Accelerated B.S./M.S.)

#### An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences:

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/ MS, Nutrition (NUTR) with a concentration in Nutrition Science (NS)The Accelerated Bachelor's/Master's (ABM) degree program HS DIET/ NUTR (NS) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in NS that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/Dietetics bachelor's and NUTR/NS master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

- Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;
- Have a UM GPA of 3.25 or better
- Be within 40 semester hours of graduation
- Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;
- Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and
- Apply for admission to the ABM Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

#### For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

## Nutrition with a concentration in Nutrition Science:

- NUTR 7412 Cellular Nutrition I
- NUTR 7422 Cellular Nutrition II
- HMSE 7010 Research Methods in HS

# Health Studies - Exercise, Sport & Movement Sciences Concentration - M.S. Health Studies - Exercise, Sport & Movement Sciences Concentration, (Accelerated B.S./M.S.)

An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences: BS, Health Studies (HS) with a concentration in Exercise, Sport and Movement Sciences (ESMS)/ MS, Health Studies (HS) with a concentration in Exercise, Sport and Movement Science (ESMS)/The Accelerated Bachelor's/Master's (ABM) degree program HS (ESMS)/ HS (ESMS) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in ESMS that also may be subsequently applied on a prearranged basis to the master's degree in HS with a concentration in ESMS that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/ESMS bachelor's and HS/ESMS master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

- Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;
- Have a UM GPA of 3.25 or better
- Be within 40 semester hours of graduation

• Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;

• Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and

• Apply for admission to the ABM Degree Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which CHS-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

- ESMS 6000 Exer Test Interp Lab or ESMS 6603 Adv Meth Strength Cond
- ESMS 7010 Research Methods in HS
- ESMS 7020 Pub/Prop in Health & Biomed

## Journalism-Journalism and Strategic Media (Accelerated BA/MA)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year.

Students interested in the ABM program should talk with their adviser as early in their studies as possible and <u>apply before they have completed 90</u> <u>credit hours</u>. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

1. Student fills out department's online application.

2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.

3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

## Liberal Studies, (Accelerated B.L.S./M.A.L.S.)

The Accelerated Bachelor of Liberal Studies to Master of Arts in Liberal Studies (MALS) program provides an opportunity for high quality, academically engaged students to complete a Bachelor's and Master's degrees in five years as opposed to the traditional trajectory of six years. The proposed program does not alter the requirements for either degree, but allows students to count up to 12 credit hours of graduate level courses toward both degrees, thereby reducing the total time to complete the MALS degree. The three required graduate courses are listed below, taken in the senior year:

UNIV 7000 Foundations of Liberal Studies (3 hours): Analytical introduction to graduate liberal studies and its theoretical framework; readings concerning the humanities, social sciences, and natural sciences.UNIV 7100 Research in Interdisciplinary Studies (3 hours): Methods of inquiry and research appropriate to graduate interdisciplinary studies.UNIV 7200 Liberal Studies Seminar (3 hours): Interdisciplinary examination of a major issue, historical period, or theme. Topic may vary.

Mathematical Sciences -Mathematics Concentration, (Accelerated B.S./M.S.)

## Mathematical Sciences Major (B.S.)

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an

understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major.:

#### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

• CHEM 1110 - General Chemistry | Credit Hours: (3) • CHEM 1111 - General Chemistry I Lab Credit Hours: (1) • CHEM 1120 - General Chemistry II Credit Hours: (3) • CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or • PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) • PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) • PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) The Major (41-42 hours in

addition to University General Education Program)

Major Core (17 hours):

Completion of

493

494

MATH 1910 - Calculus I \*\* Credit Hours:
(4) (this course is included in the University General Education Program requirements)

• MATH 1920 - Calculus II\*\* Credit Hours: (4)

• MATH 2110 - Calculus III\*\* Credit Hours: (4)

• MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3)

• MATH 2120 - Differential Equations\*\* Credit Hours: (3)

• MATH 3242 - Intro Linear Algebra Credit Hours: (3)

#### Plus the Following Courses:

(Your choice will satisfy the University General Education Program requirements for science).

• CHEM 1110 - General Chemistry | Credit Hours: (3)

- CHEM 1111 General Chemistry I Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab
- Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)

• PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)

• PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

• PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## Note:

All approved programs will include no more than 9 semester hours chosen from MATH 4607, MATH 4635, MATH 4636, MATH 4637, MATH 4640.

## Additional Course (3 hours):

Each major must take one additional upper division MATH course.

Accelerated BS/MS Degree Program, with concentrations in Applied Mathematics, Mathematics, and Statistics

This program allows outstanding undergraduates to complete both a Bachelor of Science degree in Mathematical Sciences and a Master of Science degree in Mathematical Sciences with concentration in Applied Mathematics, Mathematics or Statistics. Students admitted into the program will follow a carefully designed program of study which allows them to begin course work for the Master of Science program during their senior year. Interested students are encouraged to consult with their undergraduate advisor in the Department of Mathematical Sciences and to begin planning to enter the accelerated BS/MS degree program early in their undergraduate career. Through careful coordination with their undergraduate and graduate advisors students will be able to graduate with both a bachelor's and master's degree within a five year period.

To apply, students must have finished 18 credit hours of course work in mathematics by the end of the semester of their application. Applicants must have a cumulative GPA of 3.00 (on a 4.0 scale) as well as a GPA of 3.30 (on a 4.0 scale) in their mathematics courses. The initial application for the accelerated BS/MS degree program consists of the following two parts:

> • A letter of intent including two letters of reference and a copy of the applicant's transcript to be submitted to the Department of Mathematical Sciences

• Application with the Graduate School for "combination senior" status To continue in the program beyond the bachelor's degree, students must also apply for full admission into the Graduate School and be accepted into the master's program by the Department of Mathematical Sciences.

Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Details on courses that can be applied will be available in the Department of Mathematical Sciences. However, any graduate course work will not be used to calculate the undergraduate GPA.

## Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

495

496 NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4082, and MATH 4611

Alternatively, students may choose from the following concentrations.

• Mathematical Sciences - Statistics Concentration, (B.S.) (21 hours)

• Mathematical Sciences - Data Science Concentration, (B.S.) (22 hours)

Electives must be chosen to bring the total number of hours to 120.

## Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student **may not** enroll in MATH 3402 without having previously completed MATH 2422.

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

• In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the

497 four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411.

• Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, **and** MATH 2120 for prerequisite and graduation purposes.

• The Honors student must take MATH 4402 - Honors Thesis Seminar.

• Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

• A GPA of 3.50 in all MATH courses must be maintained.

Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

Typical 4-Year Mathematics Major Sequence

Freshman Year

#### First Semester

- ENGL 1010 English
- Composition\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)
- Social/Behavioral Sciences\* (3)
- Elective (3)
- Elective (3)

#### Second Semester

• ENGL 1020 - English

Comp/Analysis\*\* Credit Hours: (3)

- MATH 1920 Calculus II\*\* Credit
- **Hours:** (4)
- Natural Science<sup>+</sup> (4)
- Elective (3)

Semester Totals 30 hrs

Sophomore Year

#### 498

First Semester

- History\* (3)
- ENGL 2201 Literary Heritage \*\*
- Credit Hours: (3)

#### or

- ENGL 2202 Lit Heritage:
- African-American \*\* Credit Hours: (3)
- MATH 2110 Calculus III\*\* Credit Hours: (4)
- Natural Science<sup>+</sup> (4)
- Social/Behavioral Sciences\* (3)

#### Second Semester

- History\* (3)
- MATH 2702 Intro Proof/Fundamental Math Credit
- Hours: (3)
- COMM 2381 Oral
- Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts\* (3)
- MATH 2120 Differential
- Equations\*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

#### First Semester

- MATH 3242 Intro Linear Algebra
- Credit Hours: (3)
- UD MATH (3)
- UD Elective (3)
- UD elective (3)
- COMP 4001 Intro to Python Programming Credit Hours: (3)
  - 0 0

#### Second Semester

- Humanities/Fine Arts\* (3)
- UD elective (3)
- Elective (3)
- UD MATH (3)
- UD MATH (3)

#### Semester Totals 30 hrs

#### Senior Year

#### **First Semester**

- UD MATH (3)
- UD MATH (3)
- UD MATH (3)
- UD MATH (3)
- Elective (3)

Second Semester

- Elective (3)
- Elective (3)
- UD elective (3)
- UD elective (3)
- Elective (1)

#### Semester Totals 28 hrs

Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

\*Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

# Mathematical Sciences - Statistics Concentration, (Accelerated B.S./M.S.)

## Mathematical Sciences Major (B.S.)

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear

500 transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major.:

#### Mathematics:

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry
- | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry
- || Credit Hours: (3)
- CHEM 1121 General Chemistry
- II Lab Credit Hours: (1) or
- PHYS 2110 Physics for Scientists and Engineers I Credit Hours: (3)
- PHYS 2111 Sci/Engr Phys Lab I Credit Hours: (1)

• PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

• PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

The Major (41-42 hours in addition to

# University General Education Program)

## Major Core (17 hours):

Completion of

• MATH 1910 - Calculus I \*\* Credit Hours: (4) (this course is included in the University General Education Program requirements)

• MATH 1920 - Calculus II\*\* Credit Hours: (4)

• MATH 2110 - Calculus III\*\* Credit Hours: (4)

• MATH 2702 - Intro

Proof/Fundamental Math Credit Hours: (3)

MATH 2120 - Differential

Equations\*\* Credit Hours: (3)

• MATH 3242 - Intro Linear Algebra Credit Hours: (3)

# Plus the Following Courses:

(Your choice will satisfy the University General Education Program requirements for science).

• CHEM 1110 - General Chemistry | Credit Hours: (3)

• CHEM 1111 - General Chemistry Lab Credit Hours: (1)

- CHEM 1120 General Chemistry
- || Credit Hours: (3)
- CHEM 1121 General Chemistry
- II Lab Credit Hours: (1)

• PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)

• PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)

• PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

• PHYS 2121 - Sci/Engr Phys Lab Il Credit Hours: (1)

Statistics Concentration (21 hours):

502 21 hours of upper division Math, as follows: • MATH 4635 - Intro Probability Theory Credit Hours: (3) • MATH 4636 - Intro Statistical Theory Credit Hours: (3) • MATH 4637 - Stat Analysis/App Big Data Credit Hours: (3)

#### And either

MATH 4607 - Intro SAS
 Programming Credit Hours: (3)
 or

 MATH 4608 - R for Data Proc and Visual Credit Hours: (3)

## 9 Additional upper division hours chosen from Math:

- MATH 4020 Actuarial Mathematics Credit Hours: (3) • MATH 4242 - Linear Algebra Credit Hours: (3) MATH 4261 - Abstract Algebra Credit Hours: (3) • MATH 4350 - Intro Real Analysis | Credit Hours: (3) • MATH 4351 - Intro Real Analysis || Credit Hours: (3) • MATH 4361 - Complex Variables Credit Hours: (3) • MATH 4391 - Partial Differential Eqns | Credit Hours: (3) • MATH 4607 - Intro SAS Programming Credit Hours: (3) • MATH 4608 - R for Data Proc and Visual Credit Hours: (3) MATH 4640 - Intro Probability Models Credit Hours: (3) • MATH 4643 - Intro Regression/Time Ser Anyl Credit Hours: (3) MATH 4685 - Statistical Learning | Credit Hours: (3) MATH 4686 - Statistical Learning || Credit Hours: (3)
- MATH 4721 Numerical Analysis Credit Hours: (3)

Electives must be chosen to bring the total to 120 hrs.

Note:

503 All approved programs will include no more than 9 semester hours chosen from MATH 4607, MATH 4635, MATH 4636, MATH 4637, MATH 4640.

# Additional Course (3 hours):

Each major must take one additional upper division MATH course.

## Accelerated BS/MS Degree Program, with concentrations in Applied Mathematics, Mathematics, and Statistics

This program allows outstanding undergraduates to complete both a Bachelor of Science degree in Mathematical Sciences and a Master of Science degree in Mathematical Sciences with concentration in Applied Mathematics, Mathematics or Statistics. Students admitted into the program will follow a carefully designed program of study which allows them to begin course work for the Master of Science program during their senior year. Interested students are encouraged to consult with their undergraduate advisor in the Department of Mathematical Sciences and to begin planning to enter the accelerated BS/MS degree program early in their undergraduate career. Through careful coordination with their undergraduate and graduate advisors students will be able to graduate with both a bachelor's and master's degree within a five year period.

To apply, students must have finished 18 credit hours of course work in mathematics by the end of the semester of their application. Applicants must have a cumulative GPA of 3.00 (on a 4.0 scale) as well as a GPA of 3.30 (on a 4.0 scale) in their mathematics courses. The initial application for the accelerated BS/MS degree program consists of the following two parts:

#### 504

• A letter of intent including two letters of reference and a copy of the applicant's transcript to be submitted to the Department of Mathematical Sciences • Application with the Graduate School for "combination senior" status To continue in the program beyond the bachelor's degree, students must also apply for full admission into the Graduate School and be accepted into the master's program by the Department of Mathematical Sciences.

Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Details on courses that can be applied will be available in the Department of Mathematical Sciences. However, any graduate course work will not be used to calculate the undergraduate GPA.

## Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4 082, and MATH 4611

Alternatively, students may choose from the following concentrations.

• Mathematical Sciences -Statistics Concentration, (B.S.) (21 hours)

505 • Mathematical Sciences -Data Science Concentration, (B.S.) (22 hours) Electives must be chosen to bring the total number of hours to 120.

#### Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student may not enroll in MATH 3402 without having previously completed MATH 2422.

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

506 • In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411.

• Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, **and** MATH 2120 for prerequisite and graduation purposes.

• The Honors student must take MATH 4402 - Honors Thesis Seminar.

• Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

• A GPA of 3.50 in all MATH courses must be maintained. Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

Typical 4-Year Statistics Concentration Sequence

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)

507

• Social/Behavioral Sciences\* (3)

- Elective (3)

• Elective (3) • ENGL 1020 - English Comp/Analysis\*\* Credit

Hours: (3)

• MATH 1920 - Calculus

#### Il\*\* Credit Hours: (4)

- Natural Science\*\* (4)
- Elective (3)

Semester Totals 30 hrs

#### Sophomore Year

• History\* (3)

• ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

or

• ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

• MATH 2110 - Calculus III\*\* Credit Hours: (4)

- Natural Science\*\* (4)
- Social/Behavioral
- Sciences\* (3)
- History\* (3)

• MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3)

- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Humanities/Fine Arts\* (3)

 MATH 2120 - Differential Equations\*\* Credit Hours: (3)

Semester Totals 32 hrs

#### Junior Year

• MATH 3242 - Intro Linear Algebra Credit Hours: (3) • UD MATH (3)

508

• COMP 4001 - Intro to Python Programming Credit Hours: (3)

- UD Elective (3)
- Elective (3)
- MATH 4635 Intro

Probability Theory Credit Hours: (3)

• MATH 4636 - Intro Statistical Theory Credit Hours: (3)

• Humanities/Fine Arts\* (3)

- UD elective (3)
- UD elective (3)

Semester Totals 30 hrs

#### Senior Year

- MATH 4637 Stat Analysis/App Big Data **Credit Hours: (**3)
- UD MATH\*\*\* (3)
- Elective (3)
- UD elective (3)
- Elective (3)

• MATH 4607 - Intro SAS Programming Credit Hours: (3)

or

• MATH 4608 - R for Data Proc and Visual Credit Hours: (3)

- UD Math\*\* (3)
- Elective (3)
- UD Elective (3)
- Elective (1)

Semester Totals 28 hrs

Total Hours: 120

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

509 \*\*Courses offered only online or both online and onground

\*Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

\*\*\*Choose from MATH 4242, MATH 4261, MATH 4350, MATH 4351, MATH 4361, MATH 4391, MATH 4607, MATH 4637, MATH 4643, MATH 4721

Nursing -Executive Leadership Concentration (Accelerated (RN-BSN-MSN)

# Accelerated Bachelor's And Master's (RN-BSN-MSN) Degree in Executive Leadership

This program is for registered nurses who do not have a bachelor's degree in nursing or another discipline or for those individuals with an associate degree or diploma in nursing.MSN Executive Leadership ABM

# **Admission Requirements:**

The applicant must:

- Be admitted to the U of M as a degree seeking RN-BSN-MSN student.
- Have a minimum college cumulative GPA of 2.8 complete Anatomy and Physiology I and II with lab and Microbiology with lab in seven (7) years of LCON admission with a grade of "C" or better.
- Have completed the following prerequisite courses with a grade of "C" or better (English Comp I and II, Intro to Sociology or General Psychology, Math, and Nutrition).
- Have an active, unencumbered RN license, or be eligible for licensure.
- Be licensed in the state of TN or an approved state in which they will complete their clinical course work.
- Complete and submit an application for admission to the Loewenberg College of Nursing RN-BSN-MSN Program for students without a BA or BS degree.
- If transferring from another nursing program, applicants must submit a letter of good standing from the dean/director of the previous nursing program, along with a transcript, and meet LCON admission and progression standards as stated in the Undergraduate Catalog.

# **Progression and Retention Requirements:**

The student must:

- While in undergraduate level courses comply with all the retention standards of the University of Memphis as stated in the Undergraduate Catalog.
- While in graduate level courses comply with all retention and progression standards of the University of Memphis Graduate School.
- Fulfill the general education requirements for the University of Memphis in order for BSN degree to be awarded.
- Have a GPA of 2.8 or greater at the awarding of the BSN to successfully progress to the MSN program.

• Successfully complete the undergraduate nursing courses prior to entering the graduate level courses. The courses counting toward both the BSN and MSN degree must be taken prior to entering other graduate nursing courses, or taken concurrently with another graduate course in the semester the BSN is awarded.

• Follow the progression and retention requirements of both the LCON Graduate Program and University of Memphis Graduate School upon receiving the BSN and after entering the MSN portion of the program.

• Maintain a 3.0 GPA ("B"). Grades of "D" and "F" will not apply toward any graduate degree, but will be computed in the GPA. No more than 7 hours of "C-", "C," or "C+" will be applied towards meeting degree requirements.

# Accelerated Bachelor and Master (RN-BSN-MSN) Nursing with concentration in Executive Leadership

- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)
- NURS 4205 Transition Professional Nurs \*\* Credit Hours: (4)
- NURS 4206 Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)
- NURS 7007 Adv Role Development for Nurse Executives \*\*\* (Counts for NURS3005/3006 \_Professional Nursing)
- NURS 7002 Adv Nursing Research \*\*\* (Counts for NURS 4110 Evidence Based Practice)

## The following courses are required for the MSN in Nursing Executive Leadership

- NURS 7001 Health Care Policy
- NURS 7901 Relationship Building for the Nurse Executive
- NURS 7903 Accountability and Advocacy for Nurse Executives
- NURS 7303 Healthcare Finance
- NURS 7908 Healthcare Finance Practicum
- NURS 7904 Fin Mgmt and Resource Allocation for Pt Care
- NURS 7905 Improving Pt Care Delivery
- NURS 7907 Evidenced Based Leadership Practices
- NURS 7909 Nurse Executive Practicum
- NURS 7990 Scholarly Synthesis

Note: (\*courses count toward BSN and MSN degree) MSN degree to be awarded at the completion of above.)

**Total Nursing Credits: 62 credits** 

# Physics, (Accelerated B.S./M.S.)

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

#### Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

## Electives

Electives must be chosen to bring the total number of hours to 120.

## Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

## Accelerated B.S./M.S. Program in Physics

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Physics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Physics and Materials Science.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Department of Physics and Materials Science department. Each applicant will complete an interview with the graduate academic coordinator in physics.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in physics. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the M.S. program of the Department of Physics and Materials Science.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## Physics, (B.S.)/Biomedical Engineering, (M.S.)

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

#### Mathematics

• MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### **Natural Science**

- CHEM 1110 General Chemistry | Credit Hours: (3)
- CHEM 1111 General Chemistry | Lab Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)

#### Electives

Electives must be chosen to bring the total number of hours to 120.

## **Dual-Degree Programs**

Highly motivated and talented students may pursue an undergraduate degree (B.S.) in Physics followed by a graduate (M.S.) in either Physics or Biomedical Engineering in a special five-year program. This option requires serious commitment, careful planning with the student's advisor, and summer research work leading toward a Master's thesis. Students interested in pursuing this option should contact an undergraduate advisor in the Physics and Materials Science department.

## Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Political Science, (Accelerated B.A./M.A)

Program objectives for a B.A. in Political Science are: (a) basic understanding of political institutions and processes in the United States and other countries; (b) basic understanding of the ways in which countries interact with one another, directly or through intermediary institutions; (c) basic understanding of the development of political thought; (d) able to apply basic political science methodologies to political science questions; (e) able to analyze and explain political processes and outcome; (f) able to interpret political attitudes, values, and beliefs; (g) have the critical thinking skills necessary for careers in government, business, law, or academia.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (36 hours)

For the purposes of defining undergraduate requirements for the political science major and minor, the department employs four subfields, with the following courses in each:

#### American Government and Politics:

- POLS 1030 American Government\*\* Credit Hours: (3)
- POLS 3211 State/Local Government Credit Hours: (3)
- POLS 3213 Intro to Public Policy \*\* Credit Hours: (3)
- POLS 3215 Interest Groups/Amer Politics Credit Hours: (3)
- POLS 3216 Political Parties/Elections \*\* Credit Hours: (3)
- POLS 3217 The Political Media \*\* Credit Hours: (3)
- POLS 3218 The American Presidency Credit Hours: (3)
- POLS 3219 Judicial Process \*\* Credit Hours: (3)
- POLS 3220 U. S. Congress Credit Hours: (3)
- POLS 3221 Public Opinion Credit Hours: (3)
- POLS 3222 Politics, Race, and Cinema Credit Hours: (3)
- POLS 3405 Intro Law/Jurisprudence Credit Hours: (3)
- POLS 4200 Envrnmntl Law/Policy/Regulatn Credit Hours: (3)
- POLS 4202 Constitutional Law: Civil Rights Credit Hours: (3)
- POLS 4211 Const Law/National Powers Credit Hours: (3)
- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3)
- POLS 4222 Urban Politics Credit Hours: (3)
- POLS 4223 Issues/Urban Politics Credit Hours: (3)

#### **Comparative Politics:**

- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 3302 West Europe Govt/Politics Credit Hours: (3)
- POLS 3306 Latin American Govt/Politics Credit Hours: (3)
- POLS 3309 Govt/Politics of Mid East \*\* Credit Hours: (3)
- POLS 3310 Politics/Developed World Credit Hours: (3)
- POLS 3311 Global Politics and Sports Credit Hours: (3)
- POLS 3320 Human Rights/World Politics \*\* Credit Hours: (3)
- POLS 3325 Politics/Developing World Credit Hours: (3)
- POLS 3330 Politics/Globalization Credit Hours: (3)
- POLS 3340 Power/Politics/State Credit Hours: (3)
- POLS 4307 Govt and Pol Communist China Credit Hours: (3)
- POLS 4315 Revolution/Political Violence Credit Hours: (3)
- POLS 4316 Democratic Erosion Credit Hours: (3)
- POLS 4317 Democratic Transitions Credit Hours: (3)
- POLS 4820 Political History of Israel Credit Hours: (3)

#### International Relations:

- POLS 1501 International Relations\*\* Credit Hours: (3)
- POLS 3505 International Organizations Credit Hours: (3)
- POLS 3506 American Foreign Policy \*\* Credit Hours: (3)
- POLS 3509 Contmp Prblm Intl Relation Credit Hours: (3)
- POLS 4504 International Law Credit Hours: (3)
- POLS 4506 Prob American Foreign Policy Credit Hours: (3)
- POLS 4508 Theories Internatl Relations\*\* Credit Hours: (3)
- POLS 4510 Politics of Global Economy \*\* Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- POLS 4513 Human Security Credit Hours: 3

#### Political Theory:

- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- POLS 3401 Legal/Pol Thght Classical Credit Hours: (3)
- POLS 3402 Legal/Political Thght Modern Credit Hours: (3)
- POLS 3410 Contemporary Political Thght \*\* Credit Hours: (3)
- POLS 3411 Critical Race Theory Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 3420 Race and Politics in U.S. Credit Hours: (3)
- POLS 3430 Conservative Political Thought Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)

#### Note:

Students must complete POLS 1030 and POLS 4101.

Students must complete at least 6 hours in each of the four subfields listed above.

No more than 9 total hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and study abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 36 hours required for a major in Political Science. Of these 9 hours, no more than three hours of Administrative Internship (POLS 4231), and no more than six total hours in any combination of POLS 4709, POLS 4399, and POLS 4702 may be counted toward the major.

At least 15 hours in political science must be earned in residence at the University of Memphis.

NOTE: Students who have successfully completed an equivalent social statistics course prior to declaring a Political Science major are exempted from the requirement to take POLS 4101, and must substitute another upper-division course in Political Science.

NOTE: The College offers Pre-Law advising for those interested in careers in law. Also, any major in Political Science may earn a second major in International Studies. Political Science courses in International Relations and Comparative Politics fulfill requirements for both the Political Science major and the interdisciplinary major in International Studies.

#### Accelerated B.A./M.A Program in Political Science

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Political Science during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Political Science.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Political Science department. Each applicant will complete an interview with the graduate academic coordinator in political science.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in political science. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Political Science department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

#### Electives

Electives must be chosen to bring the total number of hours to 120.

## Honors Program

The department offers an honors program to qualified majors who choose to pursue a more sophisticated knowledge of the discipline, a more rigorous level of analysis, and a deeper understanding of politics. Students who have completed 55 hours of course work (with at least 9 hours in Political Science), have an inclusive grade point average of at least 3.0 and a cumulative grade point average of at least 3.25 in the major, or who can present equivalent qualifications, are invited to apply for admission to the program.

The program requires 18 hours of honors course work, 12 or more of which must be upper-division Political Science courses, and minimum final grade point averages of 3.00 overall, 3.25 in Political Science, and 3.25 in honors coursework. Honors students also have the option of completing a Senior Thesis in Political Science (POLS 4999). Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Political Science." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Details of the program are available in the Political Science Office.

## Typical 4-Year Political Science Sequence

#### Freshman Year

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH\* (3-4)
- POLS 1030 American Government\*\* Credit Hours: (3)
- Elective (3)
- Foreign Language/B.A. (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- Elective (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- or
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

- History\* (3)
- Natural Science\* (4)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- Fine Arts\* (3)
- POLS Political Theory (3)
- Natural Science\* (4)
- Elective (3)
- Elective (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

- UD elective (3)
- Elective (3)
- UD POLS (3)
- UD POLS Comparative Politics (3)
- POLS 4101 Political Statistics \*\* Credit Hours: (3)
- UD POLS Amer. Gov. & Policy (3)
- UD POLS International Relations (3)
- UD POLS (3)
- UD elective (3)
- Elective (3)

#### Semester Totals 30 hrs

#### Senior Year

• POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3)

or

- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- Elective (3)
- Elective (3)
- UD elective (3)
- Elective (4)

#### Semester Totals 28 hrs

Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Public Relations-Journalism and Strategic Media (Accelerated BA/MA)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year.

517

Students interested in the ABM program should talk with their adviser as early in their studies as possible and <u>apply before they have completed 90</u> <u>credit hours</u>. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

1. Student fills out department's online application.

2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.

3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

## Sociology, (Accelerated B.A./M.A)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (30 hours)

Completion of 30 semester hours in sociology,

- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)

- SOCI 4210 Rise of Sociological Theory Credit Hours: (3) or
- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3)

or

• SOCI 4998 - Honors Thesis Credit Hours: (3) (for Honors students)

or

- SOCI 4995 Senior Capstone Seminar\*\* Credit Hours: (3)
- Plus 15 additional upper-division hours in SOCI.

### Electives

Electives must be chosen to bring the total number of hours to 120.

## Accelerated B.A./M.A. Program in Sociology

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Sociology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Sociology.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Sociology department. Each applicant will complete an interview with the graduate academic coordinator in sociology.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in sociology. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Sociology department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## Typical 5 Year Accelerated BA/MA Sociology Sequence (Thesis) (GA)

(SOCI 7210, SOCI 7320 and SOCI 6312 in senior year count as both grad and undergrad)

#### Freshman Year (31 hrs)

#### First Semester Freshman

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- or
- MATH 1710 College Algebra Credit Hours: (3)
- BA Foreign Language 1010 (3)
- Lower Division Elective (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)

#### Second Semester Freshman

• ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)

- Natural Science (4)
- Social/Behavioral Science
- BA Foreign Language 1020
- Humanities

#### Sophomore Year (31 hrs)

#### First Semester Sophomore

• ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

or

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- BA Foreign Language 2010
- Natural Science (4)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3)

#### Second Semester Sophomore

- SOCI 3311 Social Statistics \*\* Credit Hours: (3)
- Fine Arts
- BA Foreign Language 2020
- Elective (3)
- Elective (3)

#### Junior Year (36 hrs)

#### First Semester Junior

- SOCI 3322 Methods of Social Research \*\* Credit Hours: (3)
- Upper Division Electives (6)
- Lower Division Electives (6)
- History

#### Second Semester Junior

• SOCI 4210 - Rise of Sociological Theory Credit Hours: (3)

or

- SOCI 4211 Contemp Sociological Theory \*\* Credit Hours: (3)
- Upper Division Electives (6)
- Lower Division Electives (6)
- Upper Division SOCI

#### Senior Year (27 hrs)

#### First Semester Senior

- SOCI 4999 Senior Thesis Seminar\*\* Credit Hours: (3)
- Elective (3)
- SOCI 7210
- SOCI 7230

#### Second Semester Senior

- Upper Division Elective (6)
- Lower Division Elective (3)
- SOCI 6312
- SOCI 7000 level

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

## Fifth Year MA Program (24 hrs)

Total Hours Require for MA thesis option: 30

This plan: 30 (SOCI 7210, SOCI 7320 and SOCI 6312 in senior year count as both grad and undergrad; SOCI 7914 does not count toward this 30)

#### First Semester 5th Year

- SOCI 7000 level
- SOCI 7996
- Grad Elective
- SOCI 7914

#### Second Semester 5th Year

- SOCI 7996
- Grad Elective
- Grad Elective
- SOCI 7914

# Sport and Leisure Management/Sport Commerce (Accelerated B.S./M.S.)

The Accelerated Bachelor's/Master's (ABM) degree program is a B.S. in Sport and Leisure Management/M.S in Sport Commerce. This program allows outstanding undergraduate students to begin the coursework for the M.S. in Sport Commerce during their senior year. Students are encouraged to begin planning to enter the ABM program early in their undergraduate career in consultation with their advisor. Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study that will allow them to complete their B.S. in Sport and Leisure Management degree while also beginning coursework toward their M.S. in Sport Commerce degree.

To apply, students must have a minimum 3.25 grade point average, submit two letters of reference, and provide a copy of their academic transcript to the Kemmons Wilson School of Hospitality and Resort Management. Each applicant will complete an interview with the graduate academic coordinator of the M.S. in Sport Commerce program. To continue in the program past the B.S. in Sport and Leisure Management, students must apply for full admission to both the Graduate School and the M.S. in Sport Commerce program. In the ABM program, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to a student's undergraduate grade point average.

## University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

## The Major (79 hours)

#### **Core Requirements (31 hours)**

- SLS 2105 Foundation/Sport/Leisure Mgt \*\* Credit Hours: (4)
- SLS 3104 Commercial Rec and Tourism \*\* Credit Hours: (3)
- SLS 3105 Sport/Leisure as Pop Culture \*\* Credit Hours: (3)
- SLS 3204 Org Analysis Sport/Leisure \*\* Credit Hours: (3)
- SLS 3605 Financial Management SLS \*\* Credit Hours: (3)
- SLS 3650 Promotions in Sport & Leisure \*\* Credit Hours: (3)
- SLS 4135 Sport/Culture Global Perspect \*\* Credit Hours: (3)
- SLS 4155 Sport/Leisure Governance \*\* Credit Hours: (3)

## **Culinary Essentials Certificate**

The Culinary Essentials Certificate (CEC) is a two semester (23-credit hour) undergraduate certificate program at the *Kemmons Wilson Culinary Institute* (KWCI) that prepares students to enter the culinary workforce in settings such as restaurants, country clubs, resorts, hotels, and many other food service opportunities. Students learn culinary arts fundamentals—cooking methods, flavor development, fabrication techniques, world cuisines, baking and pastry, sanitation and safety, nutritional analysis and culinary math. Students work in a hands-on and immersive environment since twothirds of the CEC Program is the practical application of knowledge and skills gained. The teaching facility is a 32,000 sq-ft, state-of-the-art culinary lab facility at the *Kemmons Wilson Culinary Institute*. The CEC Program requires a 240-hour internship to further bridge classroom learning with practical applications in the culinary field. To enhance the internship, the CEC Program also emphasizes career, entrepreneurial, and personal development skills during the program.

### First Semester Courses (12 hours):

- HPRM 2012 Intro to Culinary Arts Credit Hours: (3)
- HPRM 2013 Intermediate Culinary Techniques Credit Hours: (3)
- HPRM 2014 Culinary Leadership & Professionalism Credit Hours: (3)
- HPRM 2015 A la Carte & Restaurant Service Credit Hours: (3)

#### Second Semester Courses (11 hours):

- HPRM 2016 Essentials of Pastry & Baking Credit Hours: (3)
- HPRM 2017 Food Composition & Sanitation Credit Hours: (3)
- HPRM 2018 Intro to Garde Manger Credit Hours: (3)
- HPRM 2019 Culinary Internship Credit Hours: (2)

# **Combination Degree Programs B.P.S. in Legal Studies/Juris Doctor (B.P.S./J.D.)**

This is a "3+3" program that allows eligible UM students to earn a bachelor's degree and a law degree in six years, saving a full year of time and tuition. Students would start in the undergraduate Legal Studies Program, which emphasizes four correlated disciplines: (1) theory, process, application, and ethics of law; (2) research and investigation; (3) law-related technologies, and (4) professional decorum and communication skills. The standard Legal Studies degree requirements are compressed into three years and adjusted to ensure that students take specific courses to best prepare them for law school. Those with qualifying GPAs and LSAT scores may then apply to the Cecil C. Humphreys School of Law early in their junior year. If accepted, students would enroll in first-year law school coursework during their senior year. Credits earned as a first-year law student would count towards the final 30 hours of undergraduate coursework. Students would graduate with a Bachelor of Professional Studies (BPS) degree in Legal Studies and then continue with their final two years of law school. **Please Note:** Enrolling in the BPS/JD Program as an undergraduate does not guarantee admission to the law school. Students who are not accepted to the law school or who do not successfully complete all their law school courses may still finish their undergraduate degree in the Legal Studies Program.

## General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

## Coordinated Study (54 hours; 24 at Law School)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

No more than 15 hours of the Legal Studies Professional Core may be satisfied through transfer credit.

## Legal Studies Core

- LEGL 2400 Legal Ethics Credit Hours: (3)
- LEGL 2410 Intro to Law Credit Hours: (3)
- LEGL 3150 Legal Research/Writing | Credit Hours: (3)
- LAW 111 Contracts
- LEGL 3420 Torts Credit Hours: (3)
- LEGL 3440 Civil Procedure Credit Hours: (3)
- LEGL 3484 Bankruptcy Practices Credit Hours: (3)
- LAW 126 Criminal Law
- LAW 113 Legal Methods
- UNIV 4110 Internship\*\* Credit Hours: (3-6) -Legal

## Law-Related Electives (12 hours)

LAW 115 - Property I

LAW 125 - Property II

LAW 112 - Torts I

LAW 122 - Torts II

#### Interdisciplinary Electives (12 hours\*)

LAW 114 - Civil Procedure I

\*Three of the 12 interdisciplinary elective hours will be satisfied by first-year law school courses.

## College of Professional & Liberal Studies Requirements (9 hours; 6 at Law School)

#### **Thematic Studies**

Thematic Studies Course (3)

LAW 121 - Contracts II (2)

LAW 124 - Civil Procedure II (2)

## General Electives (16-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Philosophy/Juris Doctor, (B.A./J.D.)

Program objectives for a B.A./J.D. in Philosophy are to: (a) provide training in analytic and logical thinking, (b) learn how to read difficult texts and assess arguments, (c) conduct research, develop arguments, and present them clearly in speech and writing, (d) learn logical and analytic reasoning in preparation for the LSAT, (e) explore contemporary legal, political, and moral issues that are pertinent to legal professionals.

**Note:** While the combined BA/JD program is designed to accelerate the time to graduation, enrolling in the 3+3 program at the BA level does not automatically grant admission to the JD program. All admission decisions are based upon a holistic assessment of all application materials submitted. If admitted, 3+3 students will start as first-year law students at the beginning of what would have been their senior year. These students will complete their upper-division philosophy electives by taking first-year law school courses: Legal Methods 1, Legal Methods 2, Torts 1. They will complete their upper-division electives by taking Civil Procedure 1, Civil Procedure 2, Property 1, Property 2, Contracts 1, Contracts 2, Criminal Law. Unsuccessful applicants will complete their undergraduate degree in philosophy as seniors, and may apply to law school following the usual timeline and procedures.

## University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (30 hours)

Completion of 30 semester hours in philosophy courses including:

• PHIL 1101 - Intro to Philosophy Credit Hours: (3)

OR

- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- PHIL 3001 History of Ancient Philosophy \*\* Credit Hours: (3)
- PHIL 3002 History of Modern Philosophy \*\* Credit Hours: (3)

```
PHIL 3411 - Contemporary Moral Problems ** Credit Hours: (3) OR
PHIL 3511 - Ethical Theory Credit Hours: (3) And
```

15 additional upper division semester hours

## Typical 6 Year Philosophy BA/JD Sequence

## Freshman Year

#### First Semester

PHIL 1101 - Intro to Philosophy Credit Hours: (3) or
 PHIL 1102 - Intro to Ethics \*\* Credit Hours: (3) The celline exterior end

- Foreign Language/B.A. (3)
- MATH\* (3)
- Natural Science\* (4)
- ENGL 1010 English Composition\*\* Credit Hours: (3) Semester Totals 16 hrs.

#### Second Semester

- PHIL 1611 Elementary Logic \*\* Credit Hours: (3)
- Foreign Language/B.A. (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)
- Natural Science\* (4)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3) Semester Totals 16 hrs.

#### Sophomore Year

#### **First Semester**

- PHIL 3001 History of Ancient Philosophy \*\* Credit Hours: (3)
- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3) or
- PHIL 3516 Philosophy of Law \*\* Credit Hours: (3)
- {Note: The major requires students to take 3411 or 3511}
- History\* (3)
- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)

or

- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)
- Foreign Language / B.A. (3)
- Semester Totals 15 hrs

#### Second Semester

- PHIL 3002 History of Modern Philosophy \*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)

or

• PHIL 3516 (3)

*{Note: The major requires students to take 3411 or 3511}* 

- History\* (3)
- Social/Behavioral Sciences (3)
- Foreign Language / B.A. (3)

Semester Totals 15 hrs

#### Junior Year

#### **First Semester**

- Social/Behavioral Sciences (3)
- UD PHIL Elective (3)
- Elective (3)
- Elective (3)
- Elective (3)

#### Semester Totals 15 hrs

#### Second Semester

- Fine Arts B.A.\*\* (3)
- Elective (3)
- Elective (3)
- Elective (3)

• Elective (3) Semester Totals 13 hrs

#### Senior Year

#### **First Semester**

- UD PHIL Elective Legal Methods 1 (3)
- UD PHIL Elective Torts 1 (3)
- UD Elective Civil Procedure 1 (3)
- UD Elective Property 1 (3)
- UD Elective Contracts 1 (3)
- Semester Totals 15 hrs

#### Second Semester

UD PHIL Elective - Legal Methods 2 (credited towards PHIL major (2 hour course))

UD Elective - Torts 2 (3)

UD Elective - Civil Procedure 2 (2)

- UD Elective Property 2 (3)
- UD Elective Contracts 2 (2)
- UD Elective Criminal Law (3)

Semester Totals 15 hrs

**Total Hours through Year Four: 120** 

## Year Five and Six

**Fall Year Five** 

Typical Law school curriculum

**Spring Year Five** 

Typical Law school curriculum

Fall Year Six

Typical Law school curriculum

#### Spring Year Six

Typical Law school curriculum

## **University General Education Program**

The University General Education Program promotes a shared core learning experience for all undergraduate students at the University of Memphis and provides a framework upon which the college major can build. The major purpose of the Program is to provide students the opportunity to

acquire tools, develop skills and awareness necessary for completing a college career and assuming the roles of a lifelong learner and an active, informed participant in contemporary society.

The University of Memphis General Education Program consists of 41 hours of coursework from a variety of disciplines. Students should consult their advisors on specific General Education Program courses that may be required for the major. The following are the General Education Program categories and their approved courses. Former course numbers appear in parentheses.

526

## Communication (9 hours)

All candidates for graduation at the University of Memphis are required to complete ENGL 1010 and ENGL 1020, or their equivalents, with a grade of "C" or better. Before enrolling in <u>ENGL 1010</u>, a student must have either (1) an ACT English score of 18 or above, or (2) an SAT verbal score of 450 or above, or (3) a satisfactory completion of a placement test administered by the University of Memphis Testing Center. Those who do not meet the requirements above, must successfully complete a Developmental Combination ENGL 1010 section with a grade of "C" or better before proceeding to <u>ENGL 1020</u>. <u>ENGL 1010</u> and <u>ENGL 1020</u> must be taken in sequence; no credit will be allowed for <u>ENGL 1020</u> until <u>ENGL 1010</u> has been completed successfully.

- ENGL 1010 English Composition\*\* Credit Hours: (3)
- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- COMM 2381 Oral Communication \*\* Credit Hours: (3)

## Mathematics (3 hours)

- MATH 1420 Foundations of Mathematics \*\* Credit Hours: (3)
- MATH 1530 Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
- MATH 1710 College Algebra Credit Hours: (3)
- MATH 1730 Pre-Calculus\*\* Credit Hours: (4)
- MATH 1830 Elementary Calculus\*\* Credit Hours: (3)
- MATH 1910 Calculus I \*\* Credit Hours: (4)

## Humanities / Fine Arts (9 hours)

- ENGL 2201 Literary Heritage \*\* Credit Hours: (3)
- or
- ENGL 2202 Lit Heritage: African-American \*\* Credit Hours: (3)

#### Plus Two of the Following Courses

- ART 1030 Intro to Art\*\* Credit Hours: (3)
- ARTH 2010 World Art | Credit Hours: (3)
- ARTH 2020 World Art II Credit Hours: (3)
- CLAS 2481 Mythology \*\* Credit Hours: (3)
- COMM 1851 Introduction to Film\*\* Credit Hours: (3)
- DANC 1151 Introduction to Dance Credit Hours: (3)
- JDST 2850 Religions of Abraham Credit Hours: (3)
- MUS 1030 Introduction to Music\*\* Credit Hours: (3)
- MUS 1040 Music in America Credit Hours: (3)
- PHIL 1101 Intro to Philosophy Credit Hours: (3)
- PHIL 1102 Intro to Ethics \*\* Credit Hours: (3)
- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- RLGN 1100 Introduction to Religion \*\* Credit Hours: (3)
- THEA 1030 Intro to Theatre\*\* Credit Hours: (3)
- UNIV 3580 Hebrew and Greek Legacy\*\* Credit Hours: (3)
- UNIV 3581 Faith/Reason/Imagination\*\* Credit Hours: (3)

## History (6 hours)\*

- ANTH 3282 American Communities \*\* Credit Hours: (3) (American History)
- HIST 1110 World History to 1500\*\* Credit Hours: (3)
- HIST 1120 World History since 1500\*\* Credit Hours: (3)
- HIST 2010 U S to 1877 Credit Hours: (3) (American History)
- HIST 2020 The U S Since 1877\*\* Credit Hours: (3) (American History)
- HIST 2030 Tennessee History\*\* Credit Hours: (3)
- HIST 3863 American Ideas and Culture Credit Hours: (3) (American History)
- HIST 3881 African American History \*\* Credit Hours: (3) (American History)
- HIST 4851 History of Women in America \*\* Credit Hours: (3) (American History)
- POLS 4212 Const Law Civil Liberty \*\* Credit Hours: (3) (American History)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3) (American History)
- SOCI 3422 Racial/Ethnc Minorities \*\* Credit Hours: (3) (American History)

#### Note:

\*Students who have not completed one year of American History in high school must complete 6 credit hours of <u>American History</u> OR 3 credit hours of American History plus 3 credit hours of Tennessee History in order to satisfy the History General Education requirement. American History courses are marked.

#### Social/Behavioral Sciences (6 hours)

- ANTH 1100 Biol Anth & Prehistory \*\* Credit Hours: (3)
- ANTH 1200 Cultural Anthropology \*\* Credit Hours: (3)
- CDFS 2101 Family/Global Perspective \*\* Credit Hours: (3)
- ECON (TNe) 2010 Intro to Macroeconomics\*\* Credit Hours: (3)
- ECON 2020 Intro to Microeconomics\*\* Credit Hours: (3)
- ESCI 1301 Survey of World Regions Credit Hours: (3)
- ESCI 1401 Intro/Cultural Geography Credit Hours: (3)
- FIR 1220 Personal Financial Management Credit Hours: (3)
- HLSC 2100 Wellness Concepts Practice\*\* Credit Hours: (3)
- INTL 1101 Introduction to International and Global Studies Credit Hours: (3)
- JRSM 1700 Intro to Media \*\* Credit Hours: (3)
- POLS 1030 American Government\*\* Credit Hours: (3)
- POLS 1301 Intro to Comparative Politics \*\* Credit Hours: (3)
- POLS 1501 International Relations\*\* Credit Hours: (3)
- PSYC 1030 General Psychology\*\* Credit Hours: (3)
- PSYC 3510 Deviance/Role History Credit Hours: (3)
- SOCI 1010 Introduction to Sociology \*\* Credit Hours: (3)
- SOCI 2100 Sociology of Globalization Credit Hours: (3)
- WMST 2100 Intr/Women/Gender Study \*\* Credit Hours: (3)

#### Natural Science (8 hours) 2 courses and its lab

• BIOL 1010 - Biology of Cells\*\* Credit Hours: (3)

and

- BIOL 1011 Biology of Cells Lab \*\* Credit Hours: (1)
- BIOL 1020 Biology of Organisms\*\* Credit Hours: (3)
- and
- BIOL 1021 Biology of Organisms Lab \*\* Credit Hours: (1)
- BIOL 1110 General Biology | Credit Hours: (3)

and

• BIOL 1111 - General Biology | Lab Credit Hours: (1)

 BIOL 1120 - General Biology II Credit Hours: (3) and • BIOL 1121 - General Biol II Lab Credit Hours: (1) • BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) and • BIOL 2011 - Anat/Physiology | Lab \*\* Credit Hours: (1) • BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) and BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) • CHEM 1010 - Chemistry of Materials\*\* Credit Hours: (3) and CHEM 1011 - Chemistry of Materials Lab \*\* Credit Hours: (1) • CHEM 1020 - Chemistry of Life Credit Hours: (3) and CHEM 1021 - Chemistry of Life Lab Credit Hours: (1) • CHEM 1110 - General Chemistry | Credit Hours: (3) and CHEM 1111 - General Chemistry | Lab Credit Hours: (1) • CHEM 1120 - General Chemistry II Credit Hours: (3) and • CHEM 1121 - General Chemistry II Lab Credit Hours: (1) ESCI 1010 - Weather and Climate Credit Hours: (4) • ESCI 1020 - Landforms \*\* Credit Hours: (4) • ESCI 1040 - Physical Geology Credit Hours: (4) • ESCI 1103 - The Human Planet Credit Hours: (4) • ESCI 1050 - The Earth Through Time Credit Hours: (4) PHYS 1010 - Introductory Physics Credit Hours: (3) and • PHYS 1001 - Introductory Physics Lab Credit Hours: (1) PHYS 1020 - Survey of Astronomy | Credit Hours: (3) and • PHYS 1002 - Astronomy Laboratory Credit Hours: (1) • PHYS 1301 - Astronomy II Credit Hours: (3) and • PHYS 1031 - Astronomy II Laboratory Credit Hours: (1) • PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) and • PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) • PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) and • PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## Grade Point Average

To receive a bachelor's degree from any of the colleges in the University, students must have an Overall\* grade point average of at least 2.00.

\*The University Undergraduate Council (UUC) approved in 2018 for University of Memphis coursework and transfer coursework to count in the overall gpa and overall combined GPA effective Fall 2019. This policy change is a return to University of Memphis practice prior to Summer 2015.

\*Overall GPA refers to the combination of the student's UofM GPA and the GPA from college level transfer courses that were posted prior to Spring 2015 and after Summer 2019. Transfer work posted during Summer 2015 through Summer 2019 is not counted in the Overall GPA per the Tennessee Board of Regents transfer policy and the academic catalogs for this time period.

- For New Transfer students admitted Fall 2019, transfer credit will count in the overall and overall combined GPA
- For Readmitted students for Fall 2019, transfer credit taken since last attending the U of M will count in the overall and overall combined GPA.
- For Continuing students, transfer credit applied to Fall 2019 will count in the overall and the overall combined GPA.

Historically, overall gpa included University of Memphis work and transfer work posted through Spring 2015. Due to a change in the Tennessee Board of Regents (TBR) policy effective Summer 2015, transfer credit posted was reflected in earned hours, but no longer applied to the overall or to the overall combined gpa.

529

## Testing As A Prerequisite for Graduation

Any or all students may be required to take one or more tests designed to measure general education achievement and achievement in their major as a prerequisite to graduation, for the purpose of evaluation of academic programs. Unless otherwise provided for in any individual program, no minimum score or level of achievement is required for graduation. Participation in testing may be required for all students, for students in selected programs, and for students selected on a sample basis. Details concerning these regulations and the dates of the examinations will appear in the online class listings each semester.

## Apply for Graduation

All students are required to apply to graduate during the semester preceding the semester of graduation. The deadlines for the application to graduate are included on the Registrar's website. It is the responsibility of the student to insure that this deadline is met.

# **Undergraduate Admissions and Orientation**

# **Undergraduate Admissions and Orientation**

The Office of Undergraduate Admissions and Orientation serves to recruit, admit, and enroll undergraduate students who are academically prepared to succeed and graduate from the University of Memphis. The Office of Undergraduate Admissions and Orientation attracts freshman, transfer and international undergraduate students to join the University of Memphis student community at Memphis, Lambuth (located in Jackson, Tennessee) and UofM Global (the University of Memphis online degree programs).

The University of Memphis Office of Undergraduate Admissions and Orientation has three locations. The office location for recruitment, campus visits, and orientation are located at 101 Wilder Tower. The office for Undergraduate application operations is located at 204 Wilder Tower. The Admissions and Orientation Office at the Lambuth campus is located at 705 Lambuth Blvd. Jackson, TN 38301. All offices are open from 8:00 a.m. to 4:30 p.m., Monday through Friday. To contact, please call (901) 678-2111, email recruitment@memphis.edu or visit the Admissions website at http://www.memphis.edu/admissions.

#### Come visit the Undergraduate Admissions and Orientation Office for the following assistance:

- Information on general admission-please use the online form
- To setup a True Blue Tiger account to check application status
- To take a campus tour
- To sign up for New Student Orientation

The New Student Orientation program, which is required for all first time degree-seeking students, is held during the summer for new freshmen and transfer students. The New Student Orientation program equips new students and families with the campus knowledge of curriculum, resources and technology to facilitate their transition and development to become successful students at the UofM.

During New Student Orientation, students meet with an academic advisor, plan their course schedule, and register for classes. **Even though advisors help students select the appropriate courses, this does not relieve students of their responsibility to study the Undergraduate Catalog and fulfill all of the requirements for their specific degree program**. (Note: Before students attain senior standing, they should consult with the college level advisor or graduation analyst of the college regarding fulfillment of requirements for their degree.)

The University of Memphis offers equal educational opportunity to all persons without regard to race, religion, sex, creed, color, national origin, or disability. Inquiries about admission to any college of the University should be addressed to the Office of Undergraduate Admissions and Orientation. This office receives and processes all applications, evaluates credentials, and admits qualified students. Undergraduate applications may receive full consideration for review if received by the priority deadline dates. Applications received after that date will be reviewed on a case-by-case basis.

The University of Memphis encourages all those who feel they can benefit from the educational opportunities offered by the institution to submit an application for admission. Consideration is given to educational background, standardized test scores, high school and/or college grades, any college attendance demographics, and any other special talents and/or special circumstances which may affect the applicant's academic performance.

Certain instructional programs of the University are subject to special admission requirements and are subject to change according to the availability of institutional resources. Students wishing to enter one of these programs of study should check with the appropriate department or division offering the program in order to become familiar with these special requirements. Undergraduate programs with special admission requirements include, but are not limited to, professional degrees in art, music, or theatre (Bachelor of Fine Arts or Bachelor of Music), teacher education, educational services, nursing, and the College of Professional & Liberal Studies.

Students are encouraged to apply as early as possible. Early admission contributes to better orientation, course planning, class scheduling and financial aid and scholarship consideration. High school students planning to apply as freshmen should submit applications as soon as possible after completion of their junior year. The application for fall is usually available in August of the year preceding the upcoming fall term. The application should be completed and submitted online at http://apply.memphis.edu. The application fee may be paid by credit card or electronic check.

Credentials will be maintained for a 12-month period. After this period, credentials will be destroyed and must be submitted again before an admission decision can be made.

The priority deadlines for submitting an application for admission are: July 1 for the fall semester, December 1 for the spring semester, and May 1 for the summer session. Although application deadlines are listed above, registration for new students occurs much earlier. For example, new fall students register in June. Applications received after these deadlines may be delayed in processing or updated to the next semester.

These regulations are subject to change without notice.

First-time Freshman Applicants Transfer Applicants International Students Applicants Dual Enrollment High School Applicant Readmission (Returning Students) Applicant

# **Admission as Non-Degree Undergraduates**

Applicants who wish to apply in one of the special categories listed below are encouraged to apply by the same deadlines as stated above. While applications may be accepted until the first day of registration for the term for which the student is applying, no guarantee of admission will be made after the deadline has passed. Special category applicants who have attended other colleges will not have their previous college work evaluated for transfer until they have been approved for admission as regular undergraduates. An applicant who has applied as a degree-seeking undergraduate and was denied admission must generally wait a fall or spring semester or six months before applying for admission at the non-degree level.

Those who are admitted as non-degree students are not required to have an advisor. However, if non-degree students desire an advisor, they are assigned to the Academic Counseling Center for advising. Non-degree undergraduate students may not take more than 18 semester hours of work in a single term nor may they earn more than 24 semester hours total. This limit may be extended if there has been enrollment at another institution since last attending the University of Memphis.

Non-Degree Applicant

# **Special Non-Degree Admission Categories**

Dual Enrollment High School Applicant

# **Freshman Admission Requirements**

The University of Memphis evaluates candidates for admission on a rolling, space-available basis. All information provided in support of an applicant, including both academic and non-academic factors, are considered during a comprehensive review of every application. The Admissions Committee evaluates each applicant to determine if there is sufficient evidence to suggest that the student is capable of success at the University of Memphis. At times, more information may be requested by the committee to help make a better, more informed decision.

# **First-time Freshman Applicants**

A high school graduate who has no post-high college enrollment may be considered for admission as a first-time freshman by completing the application for admission and submitting the following to the Admissions Office:

- A final transcript of all high school credits: Early decisions can be made by submitting partial transcripts (6th or 7th semester). Transcripts hand delivered by the student must be received in a sealed envelope with school's official insignia. If any courses have been taken for dual enrollment credit, the institution(s) granting credit must be contacted by the applicant and asked to send an official transcript to the University of Memphis, Office of Undergraduate Admissions and Orientation. Students who do not present one unit of American History are required to register for the course during their first or second year at the University.
- The score report of the American College Testing program (ACT) or the Scholastic Aptitude Test (SAT): The score report is a necessary part of the application and the test date should be no more than five years old at the time of enrollment.
- A non-refundable application fee of \$25.00.

Any additional items and information requested in the application materials by the Office of Undergraduate Admissions and Orientation. Note: the freshmen admit initiative (approved by the university in 2015) is a unique practice that allows the applicants' file to be completed and decisioned prior to receipt of an application fee. Moreover, some applicant decisions will be made using self-reported GPA and standardized test scores. All admitted students will receive correspondence to pay the application fee and submit official academic documents prior to enrollment.

# **High School Curriculum Required For Admission**

No high school curriculum can assure that a given student will acquire desired learning outcomes; however, the absence of certain components greatly increases the likelihood that the student will not acquire those outcomes and reduces the likelihood that the student will enjoy maximum benefits of a college experience. The justification for colleges' recommending or requiring specific high school units for admission is to reduce the likelihood that a student will be unprepared for effective work in college and to increase maximum benefits a student may enjoy.

532

The following specific high school units will receive strong consideration in the review for admission of a freshman applicant.

#### Students who do not take one or more of these required courses, may still be considered for admission.

- English (4 units recommended): Units in this category must address reading and literature, writing, speaking and listening, and principles concerning the English language. Extensive experience in reading and writing should characterize all courses.
- Visual And/Or Performing Arts (l unit recommended): Units in this category should include a survey of the arts (visual arts, theater, music, and dance) or active participation in one or more of the arts.
- Mathematics (4 units recommended): Units in this category should include Algebra I, Algebra II, geometry and an advanced course with geometry as a major component. Students are recommended to take a fourth unit in computing, advanced mathematics, or statistics. All college freshmen will benefit by having studied mathematics as seniors.
- Natural And Physical Sciences (2 units recommended): Units in this category should include mathematical skills, fundamental concepts, and some laboratory and field work. At least one unit must address detailed knowledge in the more traditional fields of biology, chemistry, or physics and must include a laboratory.
- Social Studies (1 unit recommended): For students graduating prior to spring 1993, the unit in this category may include: history, government, geography, economics, sociology, psychology, or anthropology. For students graduating in the spring 1993 or thereafter, this unit must come from the following: modern history, ancient history, world history, world geography, or European history.
- US History (1 unit required): This is in addition to the Social Studies requirement.
- Foreign Language (2 units recommended): Two units in a single foreign language are recommended in this category.

These stipulated high school units are not intended to specify what the total high school curriculum should be. Secondary schools seek to meet the needs of various student clienteles, one of which is the college-bound student. The stipulations are an attempt to make a strategic application of academic competencies. They reflect the bridge from specific desired learning outcomes to a list of recommended college admission criteria. That list is composed of high school units presumed most likely to result in the required learning outcomes. For the sake of clarity, one unit constitutes one year of high school study of a given subject.

Applicants who wish to provide additional information regarding special talents or circumstances may do so by contacting the Office of Admissions and Orientation.

For additional Information for Non-traditional First-time Freshman Applicants including: **GED Applicants** (*under the age of 21*), **Homeschooled Applicants, Early Admission Applicants, 21+ First-time Freshman Applicants** (21 years of age or older w/a high school diploma or GED) CLICK HERE

#### Non-Traditional Freshman Admission Requirements GED Applicants (under the age of 21)

Students who have successfully completed the General Education Development (GED) Test or HISET must have official scores sent to the Office of Undergraduate Admissions and Orientation. GED/HISET applicants who apply for admission will be reviewed by the standing internal admissions committee. GED/HISET applicants (under 21 years of age) must take the national ACT/SAT exam or the ACT residual exam (ACT exams used for admission must be less than 5 years old). The minimum GED score that will be considered is 450 (or 45 on the High School Equivalency Test exam prior to the revision). GED/HISET applicants may be asked to submit a statement of academic and career goals. Emphasis should be placed on experiences that the applicant has had since leaving high school that they believe will make them a successful college student (e.g. military, successful vocational training, etc.).

#### **Homeschooled Applicants**

Graduates of home schools must comply with state law by submitting proof of registration with the local education agency which the child would otherwise attend. This documentation must be submitted in addition to the high school transcript.

The score report of the American College Testing program (ACT) or the Scholastic Aptitude Test (SAT): The score report is a necessary part of the application and the test date should be no more than three years old at the time of enrollment.

Applicants who are offered admission with the enhanced ACT English, reading or math subscores less than 19, or the equivalent on the former ACT, will be required to take special basic/developmental courses to develop academic competencies necessary for success in college level courses. Students without valid ACT/SAT scores and without college level credit in math or English will be required to take the ALEKS and Accuplacer test in the appropriate areas. Students who feel they have been misplaced by their ACT/SAT scores are encouraged to take the ALEKS and Accuplacer test, which can place them in a higher level course.

#### **Early Admission Applicants**

Academically outstanding high school juniors who have completed three academic years of high school, accumulating at least 15 units of coursework may be considered for early admission if they have the following:

A minimum high school cumulative grade point average (GPA) of 3.5 on a 4.00 scale.

A minimum ACT composite score of 26 on the ACT or the equivalent on the former ACT.

Written recommendations from high school principal and guidance counselor.

An interview with U of M faculty/staff committee selecting early admission students.

In addition, they must agree to enroll in freshman English, and, unless successfully completed in high school, courses in American history and economics.

NOTE: Early admission applicants should also check with their high school for specific graduation requirements.

# 21+ First-time Freshman Applicants (21 years of age or older with a high school diploma or GED/High School Equivalency Test)

Student applicants 21 years old or older who apply for admission will be reviewed by the standing internal admissions committee. All student applicants, in this category, must take the ALEKS and Accuplacer exam; or the national ACT/SAT exam; or the residual ACT exam (ACT exams used for admission must be less than 3 years old). The minimum GED score that will be considered is 450 (or 45 on the High School Equivalency Test exams prior to the revision). Applicants may be asked to submit a statement of academic and career goals. Emphasis should be placed on experiences that the applicant has had since leaving high school that they believe will make them a successful college student (e.g. military, successful vocational training, etc.).

# **International Undergraduate Admission Requirements**

# **International Undergraduate Applicants**

The University of Memphis believes that the presence of a balanced representation of international students on campus will enrich the educational environment of all students. Therefore, the University is authorized under federal law to enroll non-immigrant, students who currently possess a visa. Additionally, the university is authorized to issue I-20 forms to students seeking F1 and J1 visas. Applicants must file complete credentials before May 1 for fall admission; September 15 for spring admission; or February 1 for summer admission. Complete credentials include all the documents listed below.

The international application should be completed and submitted online at http://apply.memphis.edu. All additional required credentials should be sent to the Office of Undergraduate Admissions and Orientation, the University of Memphis, 101 Wilder Tower, Memphis, Tennessee, 38152-3370, U.S.A., or upload via the secure site accessible on the Admissions & Orientation webpage.

A non-refundable international application and processing fee of \$50 (fifty dollars) is required of every international applicant. Preferred payment of the application fee is by credit card. Applicants unable to pay by credit card should mail a check or money order, made payable to the University of Memphis. Applications will only be processed after the application fee is received.

International applicants should contact the Office of Admissions and Orientation for information on application procedures, qualifications, and admission to the University. Since there is considerable variation among educational systems throughout the world, international applicants will be selected on a competitive basis, after meeting the minimum standards of admission using examination scores, grade point average, relevance of academic background to intended major field of study and recommendations from the World Education Services or any credentialing service who is a member of the National Association of Credential Evaluation Services. More information may be found at http://www.naces.org/. The University often receives more applications than can be approved; therefore, admission may not be granted to all applicants who meet only the minimum requirements.

All transcripts, test scores, and other credentials must be accompanied by an official English translation of these documents and must be on file in the Office of Undergraduate Admissions and Orientation by the stated deadlines before the beginning of registration for the intended term of entry.

#### Admission Requirements for International Undergraduate Applicants

- **Required Transcripts:** Applicants must arrange for the Office of Undergraduate Admissions and Orientation to receive official copies of academic records of the applicant's attendance at secondary school, college, university, and professional institutions of learning. These transcripts must be sent directly from the high school or college to the University of Memphis. An exception is made for those who hold the bachelor's degree or its equivalent in that they need not send their secondary school records. Records should list the subjects studied and the grade, mark, or other evidence that each individual subject was completed to the satisfaction of the authorities in charge. If it is impossible for the school to send us an official copy, copies certified by an official at the American Embassy or a known world organization may be acceptable. All records must be in English. Since certificates and records filed for examination are not ordinarily returned, applicants should send certified copies if the documents in question cannot be easily replaced.
- Freshman Test Required: Applicants to the first year undergraduate level must submit scores on the Scholastic Aptitude Test (SAT) or the American College Testing Program (ACT). These tests are available only in English. All test scores should be sent directly from the testing agency or the high school to the University of Memphis.
- **Required Test of English Proficiency, for Non-English Speaking Applicants:** All applicants whose native language is not English or their primary education was not taught in English must demonstrate English proficiency. The Test of English as a Foreign Language (TOEFL) or the International English Language Testing System (IELTS) are the standard methods to satisfy the English proficiency requirement. All other methods should be approved by the Office of Admissions and Orientation. The minimum overall TOEFL score considered for undergraduate admission to the University of Memphis is sixty-one (61) on the internet-based test (iIBT) or five hundred (500) on the paper-based test (PBT). The equivalent score on the IELTS is a six (6). TOEFL information may be obtained by writing: TOEFL, Educational Testing Service, Princeton, New Jersey, 08540, U.S.A. IELTS information may be found at their website https://www.ielts.org. All test scores must be sent directly from the testing agency to the University of Memphis.
- **Financial Statement:** U.S. visa regulations require that certification of admission be based on both academic acceptance and satisfactory evidence of adequate funds to meet the expenses involved in the student's program of study. Applicants for an "F-1" student visa must supply, on the Affidavit of Support form provided by the university, sufficient evidence of financial support for themselves and all members of their families who will accompany them to Memphis. This requires that applicants certify that their intent is to attend the university full time and that no employment will be required.
- Health Certificate Required: Each international student, within 30 days from the first day of classes, must submit a certificate from a licensed U.S. physician or other qualified U.S. medical authority verifying freedom from tuberculosis. Failure to do so shall result in denial of enrollment. In the event that the student either has tuberculosis or has potential tuberculosis requiring medical treatment, continued enrollment will be conditioned upon the determination by a licensed U.S. physician that such enrollment does not present a risk to others and upon the student's compliance with any prescribed medical treatment program.

In order to enroll, all international students born after January, 1957, must prove that they have been inoculated with the live measles vaccine (MMR) since January, 1980. Exceptions are made for students who are pregnant or allergic to the vaccine.

- All international students must purchase a health insurance policy through the university or provide evidence of government sponsored health insurance before they are allowed to enroll.
- International students will not normally be allowed to register as transient students (those regularly enrolled and in good standing at another institution who desire to attend the University of Memphis for only a limited period of time). During summer sessions, exceptions may be granted only in cases where a student has an outstanding academic record and unusual circumstances are present.
- International students who wish to apply for readmission to the University must meet the deadlines stated above.
- International students must become familiar with the regulations of the U.S. Citizenship and Immigration Services (USCIS) and assume responsibility for complying with these regulations.
- Prior to the first day of class, international students should be prepared to attend a half-day mandatory new student orientation hosted by the International Students Office. Additionally, all international students must report to the International Students Office with their passport and I-20 for check-in before the first day of classes.

# **Readmission Requirements**

# **Readmission (Returning Students)**

Former undergraduate students who wish to return to the University at the same level as when they previously attended and have missed a fall or spring term, must submit an application for readmission. The application should be completed and submitted online at http://apply.memphis.edu. If the student has enrolled at another institution since last attending the University of Memphis, a transcript must be forwarded to the Office of Admissions and Orientation. An applicant will receive favorable consideration only if eligible for readmission under all University regulations, including the grade point average (GPA) for transfer students. (NOTE: International students who wish to apply for readmission to the University must meet the deadlines for new admission for international students.)

# **Non-Degree Seeking Admission Requirements**

# **Applicants with College Degree**

An applicant who has (1) earned a baccalaureate degree from an accredited institution, (2) who desires to take only a limited number of undergraduate courses, and (3) who is not presently working toward a degree at the University of Memphis may be admitted in this category.

# **Applicants with Previous College Attendance but No Degree**

A student currently or previously enrolled in any accredited college or university may be admitted in this category.

NOTE: Transient students (those regularly enrolled and in good standing at another institution who desire to attend the University of Memphis for only a limited period of time) should apply at the non-degree level.

# **Applicants with No Previous College Attendance**

An applicant who has graduated from high school or the equivalent and has never attended another college or university may be admitted in this category with the following conditions:

Students are limited to earning a total of 24 credit hours while in the non-degree category.

Applicants who are offered admission to this category and who do not have appropriate test scores in English and math who wish to take an English or a mathematics course will be required to take a placement examination prior to enrollment. Based on the results of this assessment, these applicants may be required to successfully complete basic or developmental courses prior to enrolling in degree credit courses.

Applicants in the non-degree category are not eligible to receive federal financial aid.

NOTE: Those applicants under 21 who complete their high school work during the calendar year in which they seek admission will not be considered in the non-degree category. These applicants must apply as first-time freshmen.

All non-degree students may, at any time within the stated deadlines, apply to the Office of Undergraduate Admissions and Orientation for reclassification as degree-seeking students, effective at the beginning of the next semester. Admission procedures and requirements are the same as those for degree-seeking undergraduate applicants. Applicants must file an application to be reclassified into this category and supply the following documentation:

Provide an acceptable entrance examination score or the equivalent.

The high school graduation requirement may be satisfied by any of the methods listed in the first-time freshmen section of the Undergraduate Catalog.

After students are admitted as regular undergraduates, any credit that may have been earned as non-degree-seeking students may apply toward degree programs in the college from which a degree is sought as outlined in the Undergraduate Catalog.

# **Concurrent Enrollment**

Outstanding high school students who have completed the sophomore year may be admitted and register for one college course per term of enrollment concurrently provided they supply evidence of the following:

A minimum high school cumulative grade point average (GPA) of 3.20 on a 4.00 scale.

An ACT composite score of 22 or above.

A recommendation from the applicant's high school principal or guidance counselor.

The course concurrently enrolled students register for must be taken outside of their established school day.

NOTE: Departments may establish additional criteria for their courses.

# **Audit Only Admission Requirements**

Persons who are not enrolled for credit courses may register for audit courses with the approval of the Office of Undergraduate Admissions and Orientation and the appropriate department chair. These students must have the equivalent of high school graduation or be at least 18 years of age. Tennessee residents who have a permanent and total disability, which totally incapacitates them from working at an income producing occupation, may audit courses at the University of Memphis without paying tuition charges, maintenance fees, student activity fees, or registration fees. Admission to audit will be limited on an individual classroom basis according to space availability. An application fee of \$25.00 is required.

# **Additional Means of Earning Credit**

# **Credit for Selected Secondary School Courses**

#### Advanced Placement Credit

The University of Memphis participates in the Advanced Placement Program of the College Entrance Examination Board. Appropriate credit is awarded for scores of 3, 4, or 5. Advanced placement credit may also apply to certain university requirements and to major requirements. Information about credit awarded may be obtained from the Office of Admissions and Orientation.

536

#### International Baccalaureate Program

The University of Memphis recognizes secondary students' participation in the International Baccalaureate Program and awards college credit for completion of selected courses. To be eligible for credit, students must earn a score of 4 or higher. Information on credit awarded is available in the Office of Admissions and Orientation.

## **Credit for Instruction in the Armed Services**

An official evaluation of armed services instruction is made after a student is accepted as a regular undergraduate student. Credit awarded for completion of services schools will be governed by recommendations at the baccalaureate level from the current Guide to the Evaluation of Educational Experience in the Armed Services. Military transcripts, for example SMART or AARTS, must be presented to the Office of Admissions and Orientation. Upon presentation of a copy of the veteran's report of separation (DD Form 214) to the Office of Admissions and Orientation, six semester hours of health and physical education credit will be awarded. Veterans with less than one year of continuous full-time service who have completed basic training while on active duty will be awarded credit as recommended in the Guide to Evaluation of Educational Experiences in the Armed Services.

# **Credit for Non-collegiate Sponsored Instruction**

Credit is awarded for non-collegiate sponsored instruction offered by corporations, associations, labor unions, government agencies, and training providers which has been evaluated by the National College Credit Recommendation Service of the American Council of Education and recommended in the current NCCRS guide. The Office of Admissions and Orientation should be contacted for information.

# **Credit by Examination**

Credit by examination is awarded based upon standardized examinations and upon examinations administered by departments of the University for specific courses and for placement. Students may not take an examination for credit in a course previously taken for credit, with the exception of lower division transfer courses that the student wishes to validate for upper division credit. Students may, however, take an examination for credit in a course that was audited or in courses at a lower level than a course taken for credit.

#### a. CLEP and DANTES Standardized Examinations

The University of Memphis awards credit for standardized examinations of the College-Level Examination Program (CLEP) of the College Board and for standardized examinations of the Defense Activity for Non-Traditional Education Support (DANTES). Credit awarded is based upon credit recommendations and minimum scores recommended by the American Council on Education. CLEP and DANTES credit may also apply to certain University requirements and to major requirements. For information on credit awarded, test dates, and fees, contact the Testing Center.

#### b. Departmental Examinations

Almost all courses in the undergraduate curriculum, except for those with laboratory, research, or performance requirements, are available for credit by examination. Students who believe that they have already mastered the material of a particular course offered at the University of Memphis may take a departmentally administered examination for credit in that course.

537

To apply for credit by examination, a student must be enrolled at the University of Memphis and have a GPA of 2.00 or above. Students can access the online Credit by Exam application to begin the approval process. Students pay \$60 per course, plus \$15 per credit hour in excess of three (3) credit hours per course (see Fees and Charges) prior to taking the exam. To receive credit, the student's examination grade should be the equivalent of a "C" or above. Credit is indicated on the student's record as CR.

# **Upper Division Credit by Validation Examination**

Credit for courses at the freshman or sophomore level is transferred as lower division credit even though the content may be equated to University of Memphis upper division (junior/senior) level courses in some cases. In order to receive upper division credit for a lower division course that has an upper division equivalent, the credit must be validated through appropriate departmental examinations, portfolios, or other documentation. Contact the department to see if this option is available, to make application and to obtain information. There is no fee for validation examinations.

# **Credit for Course Placement and Completion**

Some departments offer the opportunity to receive credit by course placement and completion for selected courses. Students who receive prior approval from the department chair may enroll in a University of Memphis course at the level for which they feel previous instruction or experience qualifies them. Upon completion of the course, they receive credit for certain sequential courses numbered lower than the one in which they enrolled. Recording of credit for the lower numbered course(s) is contingent upon completion of the higher level course with a minimum grade of "C". Upon completion of the course, approval of the chair of the department and payment of fees are required for credits to be recorded. (See Fees and Charges)

In the Department of World Languages and Literatures, students whose first college-level course in a language is 2010 may apply for credit for 1020 in that language. Students whose first college-level course is 2020 may apply for credit for 1020 and 2010 in that language, and those whose first college-level course in a language is a 3xxx course in composition and/or conversation may apply for credit for 1020, 2010, and 2020 in that language.

# **Credit for Experiential Learning by Assessment**

Students seeking degrees in the College of Communication and Fine Arts, the College of Education, Health and Human Sciences, and College of Professional & Liberal Studies, and some programs in the Fogelman College of Business & Economics may be granted credit for college level knowledge and understanding related to the student's major area of study and gained from work experience, life experience, or non-college instruction. The student who wants an assessment of such learning prepares a portfolio that describes and documents the learning. Portfolios are assessed by faculty who teach in that area.

Assessment by portfolio is reserved for knowledge and competencies which do not readily fit into the credit by examination procedures described above. More detailed information about procedures may be obtained from the individual colleges.

# **Credit for ACT Test Scores**

#### a. English Composition

The University of Memphis awards 3 hours of credit for ENGL 1010 to students with an ACT English subscore of 29 or above. Students who have previously taken ENGL 1010 and earned a passing or failing grade are not eligible. ACT scores for this credit are valid for 3 years.

#### b. Mathematics

The University of Memphis awards 3 hours of credit for MATH 1710 College Algebra to student with an ACT Math subscore of 29 or above. Students who have previously taken MATH 1710 and earned a passing or failing grade are not eligible. ACT scores for this credit are valid for 2 years.

#### Course Credit vs. PLA, ELA, CLEP, and Test Scores

538 In the case of an earned grade and an eligible CLEP or ACT/SAT score, the grade will supersede the exam or test score and stand as the official credit on record. ELA, PLA, and/or an exam score will not replace an earned grade for the same course.

# **Testing and Placement**

Learning Support at The University of Memphis permits students to enroll in prescribed courses to develop the academic competencies necessary for success in college level courses. Major components of the program include testing and placement in appropriate level courses. More information can be found at http://www.memphis.edu/acc/learning/index.php.

#### English

Students admitted to the University of Memphis as beginning freshmen will be placed in appropriate English courses based on ACT/SAT subscores that are less than 5 years old.

Students with ACT English and Reading subscores below 18 (or the SAT equivalent) are required to enroll in prescribed English courses. Students must check with their advisor to determine which English course is appropriate for them.

Students with ACT English and Reading subscores below 19 (or the SAT equivalent) are required to enroll in ACAD 1100. If students feel they have been misplaced by their ACT subscores in English and reading, they may take the ACCUPLACER test to attempt to place in a higher level course.

Students without ACT or SAT scores will be required to take the ACCUPLACER placement test to determine if they have the appropriate academic skills to successfully complete college level courses. Depending on the results of this test, students may be required to take one or more prescribed courses. ACCUPLACER testing is required of students whose ACT (SAT) scores are more than 5 years old, transfer students with no college level credit in English, and non-degree seeking students before enrollment in English.

Students must successfully complete prescribed course requirements before enrolling in the next level course.

#### Math

Students admitted to The University of Memphis as beginning freshman are placed in MATH courses on the basis of ACT MATH subscores (or their SAT equivalent) that are less than 5 years old.

Admitted transfer students are placed in MATH courses on the basis of either a valid ACT/SAT MATH subscore or previous college level math coursework.

- Students whose scores are expired (more than five years old) or who do not have ACT/SAT MATH subscore are required to take the ALEKS placement assessment (https://www.memphis.edu/aleks/) before enrolling in a math course.
- Students with a ACT MATH subscore less than 15 (or an SAT equivalent) are required to take the ALEKS placement assessment before enrolling in a math course. Student in this category are also encouraged to make use of the ALEKS learning modules at (https://www.memphis.edu/aleks/learning\_module/index.php).
- Transfer students with no college level credit in math and no valid ACT/SAT subscore must take the ALEKS placement assessment before enrolling in a math course.
- Non-degree seeking students without previous college coursework or without a valid ACT/SAT must take the ALEKS placement assessment before enrolling in a math course.

An ALEKS score is valid for 6 months. Any student who takes ALEKS for placement should be sure to enroll in the appropriate mathematics course as soon after taking the ALEKS as possible. After 6 months, the student must begin the process again (or use a valid ACT/SAT MATH subscore for placement).

Enrollment in MATH courses is restricted to students who have the proper pre-requisites or placement scores. Self-placement without proper pre-requisites or placement scores is not permitted.

Please refer to the table below to determine appropriate placement.

Class	MIN ACT Math Score	MIN SAT Math Score	Aleks MIN	Class Pre-req
Math 1420 C	15	380-410	14	
Math 1420	17	460-480	30	

Math 1530	15	380-410	14	Math 1710
Math 1710 C	18	490-500	30	Math 1420 or Math 1420 C
Math 1710	20	520	46	
Math 1720	24	570-580	61	Math 1710
Math 1730	24	570-580	61	Math 1710
Math 1830	24	570-580	61	Math 1710 or Math 1730
Math 1910	26	610-620	76	Math 1720 or Math 1730
Math 1421	29	680		

# **Transfer Students**

# **Transfer Admission Requirements**

# **Transfer Applicants**

The University of Memphis welcomes applications from students who have begun college elsewhere. Future Tigers, if you have questions please contact the Office of Undergraduate Admissions and Orientation at: Contact Us!

All transfer applications are assessed on a holistic review of criteria. All information provided in support of an applicant, including both academic and non-academic factors, are considered during a comprehensive review of every application. The Admissions Committee evaluates each applicant to determine if there is sufficient evidence to suggest that the student is capable of success at the University of Memphis. At times, more information may be requested by the committee to help make a better, more informed decision.

#### Transfer Applicants with Less than 15 Earned Transferable Credit Hours

Students who are transferring with less than 15 earned transferable credit hours of college-level coursework may be reviewed using the following criteria:

May be required to submit a high school transcript and standardized test score.

- Have earned at least a 2.00 GPA (as computed by the University of Memphis) on all attempted college level and developmental or remedial courses. Students who meet the high school requirements, but do not have a 2.00 GPA on attempted college coursework may be considered for admission. The admissions review committee may conusult with the Center for Academic Retention and Enrichment Services to discuss the potential for success. Students' major, types of courses taken, and pattern of progress as well as high school records and standardized test scores, will be considered in the admissions process.
- Be in good standing with the college or university previously attended.

Transfer applicants who have been academically dismissed from the last institution they attended but meet the GPA requirements listed above will not be considered for admission until at least one regular semester (fall or spring) has elapsed. After this period, these applicants must submit a new application (no additional fee required).

# **Transfer Applicants with 15 Credit Hours or More**

Students who are transferring with 15 credit hours of college-level coursework or more must meet one of the following criteria to be considered for admission:

Have earned a minimum overall combined 2.00 GPA (as computed by the University of Memphis) on all transfer hours attempted. **NOTE:** Students who have failed any developmental or remedial coursework will not be eligible for admission until they have completed these courses with a passing grade.

Have earned an associate degree in a University Parallel or University Transfer program from a regionally accredited community, junior, or senior college with an overall combined 2.00 GPA (as computed by the University of Memphis).

# **Tennessee Transfer Pathways**

Students who begin at one of the Tennessee Board of Regents (TBR) Community Colleges have the ability to transfer to the University of Memphis with assurances in how their credits will transfer. By completing the Associates Degree (AA or AS) at one of the 19 Community Colleges, they can select one of the nearly 30 Tennessee Transfer Pathway (TTP) programs at the University of Memphis.

# **Reverse Transfer**

Tennessee Reverse transfer allows transfer students who are currently attending a four-year school to combine four-year college credits with community college credits to receive an associate's degree. You may view further information in the Reverse Transfer pamphlet located here: Reverse Transfer

# **Credit Transferred from Other Institutions**

#### **Transfer Credit for Previous Instruction**

Credit from post-secondary institutions will be granted and applied toward degree requirements only when it is for courses that are substantially equivalent to those offered at the University of Memphis. Credit not equivalent to courses at the University of Memphis may be posted to the student's record and may be used as elective credit or as determined by the dean of the college from which the student is to graduate. After the student has been approved for admission as a regular undergraduate, the Office of Undergraduate Admissions and Orientation will evaluate credit for University-wide use. The office of the dean in each college has the authority for determining the use of acceptable credit toward specific degree programs in that college.

The University of Memphis accepts transfer credit for college-level courses taken at accredited institutions of higher education. Student petitions for transfer credit for courses completed at institutions that are not regionally accredited are considered on a case-by-case basis. The student must present a petition in writing to the Office of Undergraduate Admissions and Orientation at the University of Memphis with a list of courses for which credit is desired. The student must provide transcripts from the institutions, documentation from each course that includes the course content, course level, contact minutes, the standards for assessing student work, and documentation of the academic credentials of the course instructor. Based on an examination of these materials and after consultation with the appropriate academic department or college, the Office of Undergraduate Admissions and Orientation of those courses that have been approved for transfer credit.

### Earning Transfer Credit after Enrollment at the University of Memphis

University of Memphis students considering taking courses at other institutions should consult the transfer articulation tables to see how the course will transfer to the University of Memphis. For institutions and courses that are not listed on those tables, students must complete a Transfer Credit Request Form to determine if and how the course will transfer to the university. Students should consult with their academic advisor to determine how the credit will count toward their degree program. An approved Transfer Credit Request Form serves as assurance that the course will transfer. Students do not have any guarantee that courses not listed on the articulation tables will transfer or how they will count toward the students' degrees without an approved Transfer Credit Request Form and notification to the academic advisor.

Before credit earned at another institution can be transferred and recorded on a permanent academic record, the student must have an official transcript from the institution mailed to the Office of Undergraduate Admissions and Orientation .

The maximum credit hour load allowed for any term includes all course enrollments both at the University of Memphis and any concurrent enrollment at other institutions. (See "Credit Hours and Maximum Load")

### **Transfer Credit for Distance Education**

Credit from other institutions for distance education courses taught by independent study, on-line computer instruction, or other methods, is evaluated in the same manner as transfer credit for classroom-based instruction. As with other transfer credit, students enrolled as regular undergraduates must seek prior approval from the dean of the college from which they are to graduate before taking courses to meet degree requirements at the University of Memphis.

## **Transfer Credit in the GPA**

Beginning Fall 2019, transfer hours and grades will be reflected in earned hours and applied to the Overall GPA and Overall Combined GPA. (Overall GPA is used to determine undergraduate graduation and athletic eligibility. Overall Combined GPA is used to determine academic standing, financial aid, and scholarship eligibility, except for HOPE).

Note that during the period Summer 2015 through Summer 2019, transfer work is only reflected in earned hours but does not apply to the Overall GPA or Overall Combined GPA, in compliance with the Tennessee Board of Regents transfer work policy and academic catalogs at that time.

Any transfer work posted before Summer 2015 is reflected in earned hours and applied to the Overall GPA and Overall Combined GPA.

## What to Expect

Acknowledgement Application Review Admission Decision

# After Acceptance

Math Placement, Advising, Registration, ID Card, Parking, and Fee Payment.

Any questions, you may contact the Office of Undergraduate Admissions and Orientation at: Contact Us!

# **Military Students**

## **Veterans and Military Student Services (VMSS)**

The University of Memphis Veterans and Military Student Services assists veterans, service members and their families with the transition from a military environment into a positive academic community in pursuit of professional and personal development by connecting students to expert support services and tools to enhance academic and professional success.

Office Hours: Monday - Friday, 8:30 am - 5:00 pm 499 University Street University Center Suite 222 The University of Memphis Memphis, TN 38152 Phone: 901.678.4269 FAX: 901.678.4207 Email: veterans@memphis.edu

## **Veterans Educational Benefits & Certification (VEBC)**

The University of Memphis Veterans Educational Benefits & Certification thank you for your service to our country and stands ready to assist you, your spouses, or your dependents in taking advantage of your educational benefits while at the University of Memphis (UofM).

Office Hours: Monday - Friday, 8:00 am - 4:30 pm Registrar's Office 003 Wilder Tower (basement) University of Memphis Memphis, TN 38152-3520 Phone: 901.678.2996 FAX: 901.678.1425 Email: vetedbenefits@memphis.edu Website: https://www.memphis.edu/registrar/vetedben

## **Student Aid & Scholarships**

# **Financial Aid**

### **Information and Assistance**

The Student Financial Aid Office administers federal, state, and institutional aid programs in order to provide financial aid to qualified students. The programs of financial aid include Scholarships, Grants, Loans, and Student Employment. With the exception of grants, which are always need-based, each of these financial aid programs can be either need-based or non-need based. All need-based programs are based on an assessment of an Expected Family Contribution using family income and asset information provided by the completion of the Free Application for Federal Student Aid (FAFSA) by the student and/or parent. Students applying for financial aid programs that require the FAFSA must be U.S. Citizens or permanent residents, must be admitted as degree-seeking students, and if seeking a second bachelor's degree, have declared a major. The financial aid school code for the University of Memphis is **003509**.

Contact Us: Phone: 901.678.4825 | financialaid@memphis.edu

## **Aid Programs**

## **Types of Aid**

The Financial Aid Office offers students a financial aid package once the FAFSA results are received. Students can view their financial aid package on their myMemphis account. It may be a possible combination of grants, loans, scholarships, and employment to meet as much of the student's need as possible. Enrolled hours, residency classification, cumulative grade point average, and other financial assistance already received will affect the amount and type of financial aid students can receive to meet their financial need. Click here for more information about the different aid programs.

## **Course Program of Study**

Effective beginning Spring 2019, courses must apply toward a student's <u>declared</u> major/minor to count toward Federal Financial Aid eligibility. Only applies to Federal Financial Aid (e.g., Pell Grant, SEOG Grant, Stafford Loans, PLUS Loans, etc.). Does <u>NOT</u> apply to state or institutional aid (e.g., Hope, TSAC, Univ. of Memphis scholarships/grants, etc.). Students enrolled in courses impacted by CPOS will be notified via email and have an alert posted on their Financial Aid self-service page by late November. For more information about how this may impact you, review our Frequently Asked Questions page at: Course Program of Study Questions

## **Student Employment**

The University of Memphis offers two programs of on-campus employment. Federal Work-Study is a need-based financial aid program. The regular student employment program is not need-based and is available to any student enrolled at least half-time. Job openings for both programs are posted in the Student Employment Office website.

# **Scholarships**

### **Academic Scholarship Programs**

The University of Memphis offers several hundred scholarships each academic year in varying amounts depending on the particular guidelines for the scholarship and the academic credentials of the student.

For more information on UNDERGRADUATE scholarships, please visit www.memphis.edu/scholarships, or contact the Undergraduate Scholarship Office directly at (901) 678-3213 or via e-mail at scholarships@memphis.edu.

545

For more information on GRADUATE scholarships, contact the Graduate School at 217 Administration Building, Memphis, TN 38152, or call (901) 678-4212.

For more information regarding LAW scholarships, contact 203 Cecil C. Humphreys School of Law, Memphis, TN 38152 or call (901) 678-5403.

### **University Freshman Scholarships**

The University of Memphis awards hundreds of academic scholarships each year to entering freshmen. All scholarships are awarded for the academic year (Fall and Spring semesters only). Scholarships are awarded based on information submitted on the University of Memphis admissions application. A separate scholarship application is not required unless noted. The priority deadline for admission to the University of Memphis for scholarship consideration is March 1. All University of Memphis scholarship program awards are based on a combination of ACT/SAT scores and cumulative high school grade point average (7th semester). These scholarships are four year, renewable scholarships requiring full-time enrollment. Early application to the University of Memphis is strongly encouraged as scholarship awards are limited. For a detailed list of available scholarships, please visit www.memphis.edu/scholarships/listscholarships.php.

## **Departmental Scholarships**

College of Arts and Sciences Fogelman College of Business and Economics College of Communications and Fine Arts College of Education Herff College of Engineering Loewenberg School of Nursing College of Professional & Liberal Studies

### **ROTC Scholarships**

Army Navy Air Force

### **Private Scholarships**

Each year, the University of Memphis awards a number of private scholarships thanks to the generosity of faculty, staff, alumni, and other supporters of academically exemplary and financially needy students at the University of Memphis. The amounts vary with each scholarship, and scholarships are awarded on a competitive basis. For more information concerning Private Scholarships, please visit memphis.academicworks.com/.

## **Outside Scholarships**

Are you looking for a scholarship? Students and their families are encouraged to search the web to explore the exciting possibilities of finding a scholarship especially for you.

### **Important Notice**

The Federal Tax Reform Act of 1986 significantly changed the tax status of scholarships, fellowships, and grants you receive from the university. Prior to the Act, scholarships, fellowships, and grants were generally not subject to income tax. Since then, scholarship, fellowship, and grant amounts exceeding tuition, fees, and course-related books, supplies, and equipment have become taxable.

# **University & Student Business Services (Bursar)**

#### **University Fees and Charges**

All University fees and charges are calculated and assessed consistent with policies and procedures of the University of Memphis Board of Trustees. Information in this catalog is intended to cover the situations that most students will encounter. However, the University may have additional policies and procedures by which fees and charges are implemented or that apply to unusual situations.

The information in this section concerning registration fees is applicable only to students enrolled in the undergraduate colleges and departments of the University. Similar information for students in The Graduate School and The School of Law is available in the catalogs of those schools. The tuition, fees and other important student financial information is located on the University & Student Business Service Office website.

Tuition/Fees and Refunds

Fee Payment Policy Tuition Out-of State (Non-Resident) Tuition Program Service Fees Special Course Fees and Material Fees Residency Classification Academic Common Market Programs for Persons with Disabilities Programs for 60 Years of Age for Audit or 65 Years of Age or Older Refund of Tuition and Fees Veterans Programs and Benefits

#### Please note the following:

Fees for AUDITING courses are assessed on the same basis as fees for credit courses.

- The listing of any fee or incidental charge in this publication or on the University & Student Business Services website does not constitute a contract between the University and the student. As a condition of registration, each student will pay the fees in effect for the semester for which he or she registers. All questions regarding fees, fee payment, refunds, and appeals should be directed to the University & Student Business Services (115 Wilder Tower) or email usbs@memphis.edu.
- Fees are subject to change without notice. The University will usually collect the amount of fees due at the time of enrollment fees satisfaction in accordance with the residency classification and fee rates in effect. After all enrollments are complete, any over-collections will be refunded and students will be billed for any under-collections.

### **Other Fees**

Below are a few listings of other University fees. A list of special course fees, materials fees, miscellaneous fees and housing rates, etc. is available on the University & Student Business Services Office Explanation of Fees website.

Credit by Examination Dining Dollars Experiential Learning Credit Fees Foreign Language Placement Examination Late Payment Fee Late Registration Fee Return Payment Service Charge Transcripts Fee Payment Methods University ID Cards (Campus Card) Tiger Funds Student Financial Appeals

# **Services for Students**

# The Enrollment Services Student Support Center (One-Stop Shop)

The Enrollment Services Student Support Center (One-Stop Shop) is a central hub for prospective and current students to get answers and help with admissions, financial aid, scholarships and registration. The One-Stop Shop handles the majority of the walk-in traffic and incoming phone calls for the Enrollment Services Division. They also collect any documentation that the division requests in order to complete prospective and current students' admission and financial aid processing.

Come visit the One-Stop Shop if you need:

- · Assistance with admissions, financial aid, scholarships and registration forms and processes
- To drop off documentation relating to admissions, financial aid, scholarships and registration

The One-Stop Shop is located at 103 Wilder Tower and is open from 8:00 a.m. to 4:00 p.m., Monday through Friday. For assistance, please call (901) 678-2501 or send an email to EnrollmentServicesCenter@memphis.edu. More information about the One-Stop Shop services can be found at www.memphis.edu/enrollment/onestop.

## **Registration and Student Records**

Continuing students may register as early as November for the upcoming Spring semester, and as early as April for the upcoming Summer and/or Fall. The academic year consists of two semesters and a summer term. The fall semester begins in late August or early September and ends in December; the spring semester begins in January and ends in May; and the summer session is held between the end of the spring semester and the beginning of the fall semester.

Students are responsible for becoming familiar with University deadlines, rules, and regulations pertaining to registration.

The three units of the Registrar's Office (003 Wilder Tower) provide information and assistance as they relate to (1) Student Records, (2) Student and Faculty Services (registration and enrollment), and (3) Veterans Educational Benefits and Certification. Information concerning registration, grades, transcripts, and more can be found on the Registrar's Office website at http://www.memphis.edu/registrar.

**Student Records** – Current semester grades may be obtained on Student Self Service in myMemphis, the UofM portal, at https://myuofm.memphis.edu.

To release a student's transcript, the University requires either written or secure electronic authorization from the student. Transcripts may be requested online through the myMemphis portal using Credential Solutions or at http://transcriptsplus.net/order, in person (003 Wilder Tower), or by mail. A valid request made in person or by mail must include the following information: complete name and any former names; Banner ID Number (U#) or the last four digits of the Social Security Number; birth date; current address; first and last years of attendance; recipient mailing address(es), and the number of copies to be sent to each address. Requests not submitted electronically must be signed and dated. Except for transcripts ordered through Credential Solutions, which have a charge of \$2.85 per transcript, no fee is charged for the first twenty transcripts. There is a charge of \$5.00 when requesting more than twenty transcript copies at one time. No transcript(s) will be released if you have not satisfied all obligations to the University. By state law, the University cannot release grade reports and transcripts to students who have outstanding financial obligations to the University. If you have any additional questions, please contact Student Records (Transcripts) at (901) 678-3927.

**Student and Faculty Services** – This unit provides services related to student current term enrollment and personal biographic/demographic data, such as assistance with schedule adjustments (drop/add/withdrawal), name changes, change of major, enrollment verfications, etc.

Veterans Educational Benefits & Certification – This unit provides assistance for eligible national guard/reserves, veterans and/or dependents who enroll at the University using their VA educational benefits. When contacting this unit, eligible students should be prepared to furnish the following documentation:

Copy of the Certificate Of Release Or Discharge From Active Duty, (DD-214 Member-4) or other armed forces separation papers

Copy of Delayed Enlistment Contract

Copy of marriage license and children's birth certificates

Copy of final divorce decree if either veteran or spouse was previously married

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Additionally, veterans should contact this unit for information on and questions regarding: enrollment status; degree planning; repeat courses; certification; VA educational tuition deferment requests; and early registration for veterans. For more information on educational benefits and certifications, please visit http://www.memphis.edu/registrar/vetedben/index.php.

## **Student Academic Success**

#### Adult, Off Campus, and Transfer Student Services

Adult, Off Campus and Transfer Student Services within Student Leadership and Involvement (SLI), located at 243 University Center, offers an abundance of amenities to help the adult and non-traditional veteran or commuter student become better acquainted with student life. The office provides a computer lab, a quiet study area, a lounge space with free coffee and hot chocolate, transportation, off-campus housing information, monthly seminars, and the department's e-newsletter.

The Adult Student Association, is geared toward non-traditional college students, usually age 25 and older, with an informal way to receive support during their educational experience and to express concern about any particular issues that may arise.

The University of Memphis knows that academic and career success are inextricably tied to the student's welfare and effectiveness in intellectual, personal, social, emotional, physical, spiritual, financial, and family arenas. Students will find numerous programs and services within Student Academic Success to acquire and enhance a range of skills vital to their success. Some opportunities include wellness education and health care, personal counseling and stress management training, career exploration and development, internship and job search support, tutoring and academic skills development, accessibility services, leadership skills coaching, interpersonal effectiveness training, and referral services. Student Academic Success believes in partnerships with departments across the campus to address the comprehensive needs of students.

### **Career Counseling**

Career Counseling, located at 211 Wilder Tower, affords students an opportunity to explore self, career options, obtain information relating academic majors to career choices, evaluate employment outlook information, and develop realistic career goals. Through counseling, computer assistance and testing, each person is given the opportunity to make a well-considered career choice.

### **Career Services**

Career Services, located at 400 Wilder Tower, focuses on "educating, engaging, and empowering the University of Memphis community. Career Services works with students during all phases of the career development process. Services include: assessments, career planning, resume critiquing, mock interviewing, on-campus interviewing, and internship and job search preparation. Career Services offers numerous resources that assists students with their professional development and career needs. Individual advising is available to students needing assistance with resume writing, cover letters, and job and internship searches. Class and student organization presentations are offered throughout the fall and spring semesters on career-related topics such as resumes, interviews, dress for success, negotiation for job/salary offers and proper etiquette.

All services are offered free of charge. There are seven career specialists assigned to Tiger Talent communities. Please contact the office to identify your Tiger Talent community. For purposes of interviewing, registration for services through eRecruiting is required, and it is recommended that seniors and graduate students register three semesters prior to graduation. Career Services is open Monday through Friday 8 a.m.- 4:30 p.m.

### **Counseling Center**

The Counseling Center, located at 214 Wilder Tower, provides students with the opportunity to discuss and explore any concerns and feelings that are of importance to them. Problems in relationships, feelings of loneliness or inadequacy, family or marriage difficulties, depression, the inability to concentrate/study, or simply "feeling the need to talk things out" are all examples of concerns that are dealt with through the counseling center. The staff is professionally trained and experienced in working with a wide variety of student concerns through individual and group counseling, testing, programs, workshops, and referral to additional service centers on and off campus. The counselors subscribe to the confidentiality policy in the ethics and guidelines established by the American Psychological Association.

### Campus Recreation & Intramural Services (CRIS)

CRIS, located at 620 Echles Street, contributes to the health, physical, psychological, and social well-being of the university community by serving students, faculty, staff, alumni, and friends of the University of Memphis. Participation in sports and other leisure activities contributes to the total educational process through the development of skills essential for everyday life.

The Student Recreational and Fitness Center are the primary venues for recreation at the University. At this location, CRIS provides pools, weight and cardio areas, equipment purchases and rentals, outdoor and indoor gyms, field space, tennis and sand volleyball courts, exercise classes, fitness programs, personal training, massage therapy, swim lessons, clinics, informal recreation, special events, and competitive intramural and club sports focusing on our increasing leisure time. The student-oriented CRIS staff offers a wide variety of programs and give personal attention to the needs of all individual participants.

549

#### **Community Service**

The Student Leadership and Involvement Office promotes and supports service efforts by the University of Memphis students and works with local community agencies to engage students in a variety of meaningful service activities. The office serves as a resource center for community service programming in order to help students expand their understanding of social/community issues, develop leadership skills, and work on solutions to real life problems. For more information on these initiatives, contact the Office of Student Leadership and Involvement at 211 University Center.

### **Child Development Center**

The Child Development Center offers childcare services for University of Memphis students. Space is available on a first come/first serve basis. The center accepts children between the ages of 30 months and 12 years.

During the fall and spring semesters, the center's hours are Monday through Thursday from 7:30 a.m.- 9 p.m., and Friday from 7:30 a.m.- 4:30 p.m. The summer semester operating hours are Monday through Thursday from 7:30 a.m.- 9 p.m. and Friday from 6:30 a.m.- 4:30 p.m. Hours of operation may vary and be based on enrollment. For additional information, visit the Child Development Center located at 3875 Tiger Paw South (Northeast of the Central Avenue Parking Lot-adjacent to the University town-home community).

#### **Disability Resources for Students**

Disability Resources for Students, located at 110 Wilder Tower, provides information and support services that enable students with disabilities to take full advantage of the educational opportunities at the University of Memphis. Specific services are determined individually and are based on functional limitations caused by disability. Services include: pre-enrollment planning, specialized orientation, early registration, adapted campus housing, academic aids (readers, note takers, and interpreters), test accommodations, alternate format text and print materials, assistive computer technology, supportive guidance and counseling, etc. Some services require advance notice to arrange.

All persons who have a disability are encouraged to register with Disability Resources for Students and provide this office with medical documentation of the functional limitations related to their disability. This registration entitles qualified students with disabilities to the legal rights provided under Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act of 1990. Given adequate time, experienced staff will provide assistance in evaluating individual needs and in developing a plan for appropriate disability services. For more information, please contact Disability Resources for Students at (901) 678-2880.

**Fraternity & Sorority Affairs**: Thirteen international fraternities and twelve international sororities are active on the University of Memphis campus. The University strives to maintain a strong Greek community through coordination of Greek activities provided by the Office of Greek Affairs in areas of social service, philanthropy, scholarship, spiritual life, social development, and sense of leadership.

Fraternities: Alpha Phi Alpha, Iota Phi Theta, Kappa Alpha Order, Delta Tau Delta, Kappa Alpha Psi, Kappa Sigma, Lambda Chi Alpha, Omega Psi Phi, Phi Beta Sigma, Phi Delta Theta, Sigma Chi, Sigma Phi Epsilon, and Zeta Beta Tau.

Sororities: Alpha Delta Pi, Alpha Gamma Delta, Alpha Kappa Alpha, Delta Gamma, Delta Sigma Theta, Kappa Delta, Lambda Theta Alpha, Phi Mu, Pi Beta Phi, Sigma Gamma Rho, Sigma Kappa, and Zeta Phi Beta.

#### **Multicultural Affairs**

The Office of Multicultural Affairs, located at 223 University Center, provides a welcoming and supportive environment that advises students of color with regard to their academic, social, cultural, and financial affairs. With a caring and professional staff, the office helps students adjust to learning, living, and working in a large university setting.

Students also utilize the office as a source of information about opportunities for leadership development, conferences, internships, scholarships, professional schools, and community involvement.

The office is home to several student organizations, including: The Black Student Association (BSA), Black Scholars Unlimited (BSU), Empowered Men of Color (EMOC), the Hispanic Student Association (HAS), and the University of Memphis Chapter of the National Association for the Advancement of Colored People (NAACP). All UofM students are encouraged to join these organizations and can visit the office in 223 University Center.

### Parent & Family Services

Parent & Family Services, located in 215 Administration Building, informs and engages parents in the University of Memphis community. The office advocates for family involvement to promote student development and student success as well as to provide opportunities for parents and families to connect with the Tiger experience. All parents and families are encouraged to get involved and join the Parent & Family Association. For questions, comments or concerns, feel free to visit the office or call at (901) 678-5206.

550

#### **Registered Student Organizations**

There are 285 registered student organizations at the University. Student organizations represent a broad range of endeavors, including: academic, social, spiritual, cultural, service, recreational, and special interest. For information, contact the Office of Student Leadership & Involvement located at 211 University Center.

#### **Religious Life**

Religious Life is comprised of several religious organizations that provide activities and communities that focus on the religious or spiritual development of University students. Many of these organizations have ministry facilities close to campus or utilize University facilities for their programs. Organized religious groups include: Baptist Collegiate Ministry, Campus Outreach, Catholic Campus Ministry, Christian Student Center (Soma - Church of Christ), Hillel of Memphis (Jewish Student Union), Presbyterian Place, RUF (Reformed University Fellowship), and Wesley Foundation (United Methodist). There are also numerous religious registered student organizations on campus.

#### **Student Health Center**

The Student Health Center, located at 3770 DeSoto Avenue, is open Monday, Wednesday, Thursday, and Friday 8 a.m.- 4:30 p.m. and Tuesday 9 a.m.- 4:30 p.m. The facility is closed evenings, weekends, holidays, and announced university holidays. Early evening hours may be available Monday through Thursday, 4:30 - 6 p.m. during fall and spring semesters.

Medical services are available to students, faculty, and staff members on a walk-in basis. Each visit to the Student Health Center requires the individual to present a valid University of Memphis identification card before treatment is provided.

The Student Health Center is staffed with a physician, nurse practitioners, nurses, laboratory and X-ray technologists, health educators, and various administrative support personnel. The department's major emphasis is on the diagnosis and treatment of short-term, acute medical illnesses on an outpatient basis. One's family doctor should continue to be the primary source for medical care. A Family Planning Clinic is provided by the Shelby County Public Health Department at Student Health Services on Mondays, Wednesdays, and Fridays. The Family Planning Clinic schedules appointments and provides birth control information, devices, medications, and examinations (by appointment).

Health Center visits, along with in-house laboratory analyses ordered by the provider, are free of charge for students. The patient will be asked to pay for laboratory tests sent to an outside laboratory for analyses. Payment may be made by cash, check, MasterCard, Visa, Discover, American Express credit card, or Tiger Fund\$. When in-depth evaluation or treatment is needed, the patient is referred off-campus, and the patient is responsible for all charges incurred at that facility. Family Planning Clinic charges are on a sliding fee scale, and payment is made directly to the Family Planning Clinic.

#### Student Leadership and Involvement (SLI)

SLI, located at 211 University Center, provides programs and opportunities through which students may experience meaningfully involvement on campus. SLI includes: Adult, Off Campus and Transfer Student Services, Community Service, Fraternity & Sorority Affairs, Registered Student Organizations, Student Activities Council and Student Government Association.

#### Student Activities Council (SAC)

SAC within SLI is the principal programming body for the university community. It is composed primarily of student volunteers for the purpose of providing social, cultural, recreational and educational activities, and events that appeal to a wide variety of interests. Music, comedy, films, lectures and cultural events are just a few of the many activities planned and facilitated by the Student Activities Council (SAC).

#### Student Accountability, Outreach and Support

Student Accountability, Outreach and Support, located at 359 University Center, is responsible for the administration of the University of Memphis Code of Student Rights and Responsibilities, which outlines the rules and regulations necessary to govern the behavior of students and student organization.

The case manager for the Student Accountability, Outreach and Support is available to support students with emergency needs and can be contacted at (901) 678-2298. The case manager also oversees our Tiger Pantry, which helps alleviate food insecurity for students.

#### Student Government Association (SGA)

551 SGA within SLI is a unique organization of students who work together and are committed to improving the University community. SGA represents all students, both graduate and undergraduate, and strives to bring each student's interest to the forefront. The University of Memphis SGA consists of the Executive members, the Senate, the Student Court, and the Freshmen Council. The SGA office is located at 214 University Center.

### **Tiger Dining**

Tiger Dining offers a variety of dining facilities, vending areas and coffee bars in a number of locations on campus, including two all-you-care-to-eat options, Fresh Food Company and a Union Food Court that includes: Chick-fil-A, Taco Bell, Topio's Pizza, and several other national brands. Tiger Dining also offers a variety of meal plans for students living on and off campus. For catering information, contact the office at (901) 678-2046.

## **Other Activities**

### **Other Activities and Services**

#### **Academic Counseling Center**

All freshmen, transfer, and readmitted students who have not decided upon an academic major are assigned to the Academic Counseling Center (ACC). The purpose of the ACC is to provide academic counseling that will prepare students to choose a major and then be enrolled into one of U of M's degree granting colleges. The counselors are available by appointment to discuss the many academic programs offered and to help the students explore these possibilities as they relate to their personal and educational goals.

#### Athletic Academic Services

The Center for Athletic Academic Services is located in Wilder Tower, room 600, and provides counseling, tutoring, scheduling assistance, career planning and special services for all the University of Memphis student athletes. The center also handles NCAA interpretations and the academic eligibility requirements of student athletes.

#### Center for International Education Services (CIES)

The Center for International Education Services (CIES) is home to the Study Abroad Office, the Intensive English for Internationals program and the International Student Services Office. The center's mission is to provide comprehensive support for the needs of the international community at the University of Memphis and to prepare our students to become global citizens.

#### Intensive English for Internationals (IEI)

The Intensive English for Internationals (IEI) program offers a comprehensive study of the English language to students from around the world. The IEI curriculum prepares students for entry into graduate and undergraduate programs at U of M and other universities throughout the United States. Additionally, the IEI program offers courses to international professionals living in the Memphis area to improve their working knowledge of English. Students have many varied opportunities to participate in unique programs designed to enrich their experiences at Memphis, such as the Conversation Partners Program Friendship Families, conditional admissions to the U of M and preparatory classes for TOEFL, and other standardized tests.

IEI offers five 8-week sessions during the academic year with starting dates in January, March, May, August and October. Classes are small and designed to develop communication and academic skills in English through speaking, listening, reading, and writing.

#### **Study Abroad**

The Study Abroad Program provides students with the opportunity to combine a rigorous academic program with a cross-cultural learning experience that is not available in the United States. University of Memphis students may choose from over 200 semester, academic year and short-term programs in 60 countries to meet their diverse needs. Most programs offer courses fully taught in English while others provide the opportunity to increase foreign language skills. Program options include direct exchanges with partner institutions abroad, affiliate programs with organizations that sponsor programs in countries throughout the world, and short-term faculty-led programs.

Competitive Study Abroad Scholarships are available to both undergraduate and graduate students. In addition, financial aid, along with most academic scholarships can be used towards the cost of a study abroad experience.

The Study Abroad Office also manages the University's partnerships and agreements with international institutions and provides support to J-1 international exchange students attending the University of Memphis.

#### International Student Services (ISS)

International Students Services (ISS) provides a wide range of services and support for F-1 international degree seeking students and their dependents. Some of the services include compliance with U.S. visa and Immigration regulations for international students, maintaining University compliance with the United States Student and Exchange Visitor System (SEVIS) that reports directly to the U.S. Immigration and Customs Enforcement division of Homeland Security (ICE). Outside of compliance and reporting issues, the ISS Office conducts orientations and informational workshops for international student development and retention and designs cross-cultural programs to integrate international students into the academic, social, and cultural life at the University of Memphis.

#### **Pre-Health**

The University of Memphis offers the prerequisite courses student must complete prior to applying for admission to professional school in medicine, dentistry, optometry, osteopathic medicine, pharmacy, veterinary medicine, podiatry, chiropractic medicine, physician assistant or cardio-respiratory care, as well as the prerequisite classes required for admission to an allied health program such as cytotechology, dental hygiene, health information management, medical technology, occupational therapy, or physical therapy.

The Pre-Health Advising Center, located in 107 Scates Hall, and designated faculty members work closely with students seeking admission to professional school. Students receive counseling in regard to course sequencing and professional school admission requirements. In addition, the Pre-Health advisor coordinates workshops and meetings with health science professionals to provide students with in-depth insight into their chosen profession.

The University of Memphis Chapter of Alpha Epsilon Delta (AED), the National Premedical Honor Society, holds regular peer mentorship sessions and activities of interest to pre-health students. Qualified students are encouraged to apply for membership in AED. Membership eligibility criteria and application forms are available in 107 Scates Hall.

The Pre-Health Advising Center welcomes the opportunity to be of assistance to students whose goal is admission to a health science professional school and encourages them to take advantage of the opportunities the Center provides.

#### **Pre-Law Resource Center**

The Pre-Law Resource Center provides resource advising for students interested in applying to law school. Pre-law students must meet with their academic advisor on a regular basis to discuss degree requirements, progress toward degree completion, and course sequencing for each semester.

Law schools do not prescribe a definite pre-law curriculum for prospective applicants. Therefore, there is no single major required for pre-law students. Instead, law schools seek to attract applicants possessing a broad educational background. The University of Memphis offers a minor in Legal Thought and Liberal Arts, designed for students who intend to enter the legal profession. Course work in the minor introduces students to the major intellectual traditions of the West and assists in the development of the skills necessary for future success in law school.

The Pre-Law Society provides students the opportunity to meet practicing attorneys, judges, law school faculty and admissions officers as well as other students with similar interests. The society, in cooperation with the Cecil C. Humphreys School of Law, sponsors an annual orientation afternoon at the law school during which members have the opportunity to attend classes and meet law faculty and students.

Students interested in law school, the minor in Legal Thought and Liberal Arts or the Pre-Law Society should contact the Pre-Professional advisor in room 107 Scates Hall.

#### The University Store

The University Store is managed by Barnes and Noble Bookstores, Inc. for the convenience of students, faculty, and staff. In addition to textbooks and required school supplies, the store handles a large selection of general books, complete line of insignia clothing and gift merchandise, microcomputers, art supplies, and a variety of items for the convenience of the resident students.

#### **Mail Services**

The University Post Office has post office boxes available for rent by students and faculty. Student mail should be addressed as follows:

Student Name

The University of Memphis

XXXX Campus Postal Station

Memphis TN 38152-xxxx

Automobiles on Campus

Each student who operates and parks any motor vehicle on the campus of the University of Memphis must be registered with Parking & Transportation Services by receiving an official permit (hang tag). Permits (hang tags) are permanent and must be displayed when parking a vehicle on campus. The Parking Office will issue each new student a permit (hang tag) when the student registers for classes. The student will receive a validation sticker for placement on the original parking permit every subsequent semester that he or she registers.

A valid parking hang tag does not guarantee a parking space on University property. It is the driver's responsibility to locate an authorized parking space and abide by the parking rules and regulations of the University of Memphis. Citations will be issued and vehicles may be towed for violations.

#### Art

The Department of Art sponsors visiting artists and lecturers, workshops and symposia through the academic year. The Art Museum of the University of Memphis (AMUM) provides students and the community with an on-going schedule of exhibitions. It also houses permanent collections of African and Egyptian art and artifacts. The Museum maintains a wide selection of objects from ancient to contemporary that are available for student research.

#### Music

The Department of Music presents annually some 200 concerts, recitals and other cultural events to the University and community at large. It offers many activities and programs in which students may participate as individuals or as groups. Qualified students, regardless of major, may participate in the numerous musical groups including the University Symphony Orchestra, the University bands, and a variety of choral groups and small instrumental ensembles. Additionally, the University's state-of-the-art recording studios are open for student use after proper instruction.

#### **Theatre and Dance**

The Theatre and Dance Department sponsors guest artists, workshops, and a full season of theatre and dance productions available to all full-time students. Additionally, all students, regardless of major, are invited to participate in departmental productions either as performers or backstage persons. Production opportunities exist in both the main theatre and dance season as well as many informal activities such as Lunchbox Theatre.

#### Communication

Programs in radio, television, and film are offered by the Department of Communication. WUMR-FM 92 is student operated. Two state-of-the-art television/film studios also offer students the opportunity to participate in broadcasting quality productions.

#### Publication

The Daily Helmsman, which has published continuously since 1931, is an independent student newspaper at the University of Memphis. The print edition is published four days a week, Tuesday through Friday, August through May. Editorial decisions are made entirely by student editors without influence or censorship by faculty, staff, or administrators.

#### **Goodwyn Institute Lectures**

The lectures and addresses offered by the Goodwyn Institute cover a variety of subjects. The purpose of these lectures is to provide a system of continued education for adults and youths along general and special interests, concentrating on illustrated lectures covering all areas of the world, and to afford authoritative and accurate information upon practical and cultural subjects.

#### **Spirit Squads**

#### Cheerleaders

The University of Memphis cheerleaders are one of the "Premier College Squads in the Nation." The cheerleading squads consist of a Varsity team (up to 10 couples) and an all-women "Blue Squad" that has 14 to 16 members. The mascot, "Pouncer," and both squads cheer at all University of Memphis home football and basketball games. The Blue Squad also cheers for the Lady Tigers' home games in the Field House on the University of Memphis campus. The cheerleaders and "Pouncer" are involved in an array of community and University activities. For additional information, contact the Cheerleading Office, Room 375, Field House.

### **Pom Squad**

The University of Memphis Pom Squad is the top dance team in the country, having won the National Championships nine times. There are two squads, the Varsity and Junior Varsity. Both squads perform at all home football games. The Varsity attends all men's basketball games, performing half-time shows at selected games. The Junior Varsity performs at the Lady Tigers' home games. For additional information, contact the PomPon Office, Room 377, Field House.

## **Honors and Awards**

## **Honor Societies**

Alpha Epsilon Delta, international premedical honor society Alpha Kappa Delta, the national honorary society in sociology Alpha Lambda Delta, a national honor society for freshman students Black Scholars Unlimited, an honor society promoting academic experiences in scholarship, leadership, and service with special emphasis towards black students Chi Beta Phi, a national science and mathematics honorary society Chi Sigma Iota, a national counseling honor society Gamma Beta Phi, an honor and service society Gamma Theta Upsilon, a national honorary society for geography students. Golden Key National Honor Society, a national interdisciplinary honor society for academically outstanding juniors and seniors Honors Students Council, an organization for University Honors students Kappa Delta Pi, a national honor society in education Lambda Pi Eta, a communications studies honorary Mortar Board, a national honor society established to provide for cooperation among honor societies for seniors Omicron Delta Kappa, the National Leadership Honor Society Order of Omega, a national honor society for members of Greek fraternities Phi Alpha Theta, the national honor society in history Phi Eta Sigma, a national freshman scholastic honor society Phi Kappa Phi, a national all-discipline honor society Pi Delta Phi, a society to recognize outstanding scholarship in French language and literature Pi Sigma Alpha, the national honor society in political science Pi Tau Sigma, the national honor society in mechanical engineering Pinnacle, an honor society for nontraditional students Psi Chi, the national honor society in psychology Sigma Delta Pi, the national Spanish honor society Sigma Pi Sigma, a national honor society for physics students Sigma Tau Delta, a national honor society for English language and literature students Tau Beta Pi, a national engineering academic honor society

### Awards

Who's Who Among Students in American Universities and Colleges is one of the highest honors that a student may receive at the University of Memphis.

Special Awards

### **Departmental Awards**

College of Arts and Sciences Fogelman College of Business & Economics College of Communications and Fine Arts College of Education Herff College of Engineering Loewenberg College of Nursing College of Professional & Liberal Studies Department Of Aerospace Studies Department Of Military Science Department Of Naval Science

# **Special Awards**

Maria Leonard Scholarship Award is presented annually by Alpha Lambda Delta, national scholastic honor society, to the senior member of the society with the highest academic average.

555

**Golden Key National Honor Society** presents annually two scholarships to junior and senior members of the local chapter who have excelled in scholarship, leadership and participation in activities.

Phi Kappa Phi Scholarship Awards are presented annually to five undergraduate and graduate members who demonstrate high scholastic ability and excellent leadership, who provide meaningful service to the University, and who will continue their studies at the University.

The David A. Collins-Omicron Delta Kappa Leadership Scholarship Award is presented to a member of the U of M Circle who will continue studies at the graduate level, who has shown responsible and effective leadership, who has made significant contributions to the student body, and who inspires and encourages others to use their leadership talents for the benefit of their peers.

The Honors Program Director's Award is presented to an honors student for outstanding academic performance in an honors curriculum.

The Jimmy Carter Presidential Award for Volunteerism is presented to that student who best exemplifies the spirit of volunteerism and action that helps alleviate human need.

The Joseph R. Riley Student Service Award is presented for outstanding service to the Honors Program and the Honors Student Association.

The Samuel T. Boswell Student Leadership Award is presented in recognition of outstanding leadership in campus issues and activities, example set for peers, the display of personal and political courage, and/or community involvement.

Rosetta I. Miller Award is presented to the outstanding woman student who has returned to college despite significant hardships.

**Greek All-Sing Follies Scholars Merit Awards:** Scholarships of \$250 each are awarded annually by the Interfraternity Council to the pledge/associate from the previous fall or spring semester who attained the highest grade point average, and to the fraternity member with the highest grade point average over the past two consecutive semesters.

**The Women's Panhellenic Council** annually awards one \$250 scholarship to the sorority member who has attained the highest scholastic average. In addition, a Pledge Scholarship in the amount of \$250 is awarded to the fall semester pledge who attained the highest average for the semester.

**Two Panhellenic Council** scholarships are awarded each spring to the PHC fraternity man and sorority woman who have obtained the highest cumulative grade point average for the previous year. Awards are in the amount of \$250 each.

Women's Intercollegiate Athletics Scholar Award is presented annually to the woman athlete who has maintained the highest grade point average while at the University.

The Elma Roane Outstanding Woman Athlete Award is presented to the junior or senior woman athlete who best exemplifies the following qualities: drive, enthusiasm, determination, concern for others, love for athletics, maturity, involvement in campus activities, and self discipline in all aspects of life.

**Campus Recreation and Intramurals Awards** are presented annually to the intramural Greek, intramural Independent Resident, Panhellenic Manager of the Year, and Outstanding Official of the Year who show leadership and interest in the intramural program.

## **College of Arts and Sciences**

The College of Arts and Sciences Awards

THE COLLEGE OF ARTS AND SCIENCES DEAN'S AWARD FOR OUTSTANDING UNDERGRADUATE STUDENT is presented to a student who has displayed outstanding academic achievement, as well as strong leadership, character, scholarship, and contribution to department and campus activities.

**THE DEPARTMENT OF ANTHROPOLOGY** presents the Outstanding Anthropology Senior Award to the student with the most outstanding record of academic achievement in the major. The department also presents the Outstanding Anthropology Student Service Awards to the graduating student with the most outstanding record of contributions to service and engaged outreach.

THE BIOLOGY FACULTY AWARD is presented to the undergraduate student who makes the most significant contribution to the department. THE DEPARTMENT OF CHEMISTRY presents the Outstanding General Chemistry Student award to the student in Principles of Chemistry who has demonstrated outstanding leadership ability and scholastic achievement.

THE DEPARTMENT OF CRIMINAL JUSTICE annually presents the Mu Sigma Chi Professional Criminal Justice Award to the student of Criminal Justice deemed outstanding in professional activities.

THE DEPARTMENT OF ENGLISH offers several awards:

The Distinguished Scholarship Award presented each year to the English major whose work demonstrates an unusually high order of academic excellence.

556

Honors Thesis Award presented in recognition of the outstanding honors thesis by a student in the English Honors Program. Giem and Collins Writing Contest presented for excellence in student writing produced in freshman and sophomore English courses.

**THE DEPARTMENT OF EARTH SCIENCES** annually presents the Outstanding Senior Award to a senior in Geology exhibiting scholarship, leadership and service. The department also presents each year the Paul H. Sisco Award to the outstanding senior Geography major.

THE DEPARTMENT OF FOREIGN LANGUAGES AND LITERATURES presents the Outstanding Foreign Language Student of the Year award to a major who has consistently excelled in the discipline.

**FRENCH GOVERNMENT ASSISTANTSHIPS:** The French Government through the French Embassy in The United States, on the recommendation of the French Section of the Department of Foreign Languages, each year awards one or more assistantships in France for the teaching of English in secondary schools.

**THE DEPARTMENT OF HISTORY** annually presents the Tennessee Historical Commission Award to that senior student of History judged by the faculty to be the outstanding History major. The department also presents an award for the outstanding paper presented by an undergraduate. **THE INTERNATIONAL STUDIES PROGRAM** Outstanding Senior Award is presented to the student with the most outstanding record of academic achievement in the major.

**THE DEPARTMENT OF MATHEMATICAL SCIENCES** annually presents the R. P. Clark Memorial Award to an outstanding junior. **THE DEPARTMENT OF PHILOSOPHY OUTSTANDING STUDENT AWARD** is presented to a student in Philosophy chosen on the basis of high scholastic achievement, papers written, and performance in senior honors seminars.

THE DEPARTMENT OF PHYSICS each year presents the Outstanding Student Award to the most distinguished senior Physics major.

**THE DEPARTMENT OF POLITICAL SCIENCE** presents the Outstanding Student Award each year to the graduating senior majoring in Political Science who has compiled the best record of academic achievement in the discipline. Also The John W. Burgess Award is presented for meritorious achievement in Political Science, and the Pre-Law Award is presented to the political science major whose pre-law studies demonstrate high promise for a distinguished legal career.

**THE DEPARTMENT OF PSYCHOLOGY** presents annually The Dr. Milton C. Addington Award for Excellence in Psychology to the senior Psychology major exhibiting the most individuality, interest, initiative, integrity, creative ability and originality.

**THE DEPARTMENT OF SOCIOLOGY** annually presents The Jerry Michel Outstanding Student Award to the senior student judged to be the outstanding Sociology major.

**ALPHA EPSILON DELTA**, the health pre-professional honor society, annually presents the Student of the Year Award to the member who has demonstrated outstanding leadership, loyalty, and responsibility.

**THE CHI BETA PHI SCIENCE AWARDS** are presented to students who have attained the highest academic average during their four years of study in each of the following disciplines: Biology, Chemistry, Geology, Mathematical Sciences, Physics, and Psychology.

## **Fogelman College of Business and Economics**

## The Fogelman College of Business and Economics Awards

**Dean's Award for Most Outstanding Student** is presented to an outstanding student who has displayed strong leadership, outstanding character, scholarship, and who is active in department and campus activities.

School of Accountancy Outstanding Graduate Award is presented to the graduating student who has the highest overall scholastic average among all Accountancy majors.

The Tennessee Society of Certified Public Accountants Award, Memphis Chapter, is presented annually to the graduating student who has the highest overall scholastic average among all Accountancy majors.

The Outstanding Economic Undergraduate Student Award is presented by the Department of Economics to a junior or senior Economics student with the highest grade point average. A similar award is presented to the graduate student in Economics.

The Memphis Chapter of The Society of Chartered Property Casualty Underwriters annually awards a check and a plaque to the outstanding student in the field of insurance.

Academic Excellence Award for the Department of Management is presented annually to the B.B.A. graduate in Management of the past year with the highest scholastic achievement.

Academic Excellence Award for the Department of Management Information Systems and Decision Sciences is awarded to the B.B.A. graduate of the previous year with the highest scholastic achievement.

**Outstanding Undergraduate Marketing Student** is presented to a graduating student with outstanding scholastic achievement and service to the department, University, and community.

557

**Outstanding Undergraduate Logistics/Marketing Major is** presented to a graduating student with outstanding scholastic achievement and service to the department, University, and community.

**Outstanding Undergraduate Marketing Management Major** is presented to a graduating student with outstanding scholastic achievement and service to the department, University, and community.

**Outstanding Undergraduate Sales Major** is presented to a graduating student with outstanding scholastic achievement and service to the department, University, and community.

**Crawford Delta Sigma Pi Award** is awarded annually to an outstanding pledge member of the Delta Sigma Pi Fraternity who has demonstrated creative leadership skills and outstanding scholastic ability.

**Delta Sigma Pi**, international business fraternity annually awards a scholarship key to the student in The Fogelman College of Business and Economics graduating with the highest academic average in business.

The Union Planters/U of M Fogelman College Alumni Chapter Scholastic Achievement Awards are awarded each semester to three graduating seniors in recognition of their outstanding scholastic achievement in the college. Award includes a check and their names inscribed on a plaque.

## **College of Communication and Fine Arts**

### The College of Communication and Fine Arts Awards

**Dean's Academic Achievement Award** is available to a student majoring in a discipline within the College of Communication and Fine Arts. It recognizes the graduating student with the highest grade point average.

**Dean's Creative Achievement Award** is based on outstanding creative activity in the areas encompassed by the College of Communication and Fine Arts.

Creative Achievement in Art is awarded annually by the Art Department for outstanding creative achievement in art to a senior majoring in Art. A cumulative GPA of at least 3.0 is required.

"Best of Show Award" Juried Student Exhibition is awarded annually to the student whose work is judged "Best of Show" in the Annual Juried Student Exhibition.

Thesis Award in Art History is presented in recognition of an outstanding masters thesis in Art History.

Art History Graduate Award is presented annually to a graduate student for outstanding initiative and research.

Art History Undergraduate Award is presented annually to an undergraduate student for outstanding work in Art History.

Society of Professional Journalists, Memphis Chapter, annually presents a certificate of achievement and a cash award to the student chosen as outstanding in the field of Journalism.

**Society of Professional Journalists,** Sigma Delta Chi Mark Of Excellence Awards, Arkansas, Louisiana, Mississippi, West Tennessee Region, annually presents first place awards for Best TV Broadcasting, Best Editorial Cartoon, Best Feature Article, and Best Photography Feature.

Sigma Alpha Iota College Honor Award is an award based on musicianship, scholarship, and general contribution to the collegiate chapter.

Sigma Alpha Iota Honor Certificate is presented annually to the graduating senior of this chapter having attained the highest academic average.

Paul Eaheart Memphis Woodwind Quintet Scholarship is presented in honor of Paul Eaheart for excellence in wind performance.

Lubrani Clarinet Award, in memory of Professor Frederic Lubrani, is presented for clarinet performance ability, general scholarship, service to the Rudi E. Scheidt School of Music, and potential in the profession.

Smit Composition Award is presented in memory of Professor Johannes Smit for excellence in composition.

**Hearst Awards** are presented as the result of an annual national Writing, Broadcasting, and Photography competition among accredited journalism programs for work appearing in student publications. Cash prizes range from \$200 to \$2,000 with matching awards going to sponsoring journalism departments.

558

Hohenberg Foundation, Inc. Dance Award is presented annually to a student pursuing a Bachelor of Fine Arts degree with a concentration in Dance. The recipient must have at least a 2.5 GPA.

Art Center Supply Award is given annually to a sophomore, junior, or senior majoring in Graphic Design. Selection is based on portfolio and academic performance.

**Memphis-Germantown Art League Award** is presented annually in the spring to an undergraduate Art major who has demonstrated exceptional artistic abilities in any discipline within the Department of Art.

University Bookstore Supply Award is given annually to an undergraduate Art major. Selection is based on portfolio and academic performance.

The Linn Sitler Theatre Award is presented to an outstanding Theatre student with a minimum GPA of 3.0.

The Saul Brown Award is given to a Journalism major concentrating in news writing. Saul Brown retired from the Memphis Press-Scimitar in 1980 as the newspaper's chief photographer. Selection for the award is based on talent, skill, and a student's promise as a journalist as demonstrated by his or her articles and/or photographs.

The Kappa Tau Alpha Award is given to the member of Kappa Tau Alpha Journalism honor society who has achieved the highest academic average.

The MTNA Student Achievement Award is given by the Music Teachers National Association annually to a music student for excellence in studio teaching.

The Raymond Lynch Oboe Award established to recognize the distinguished career of the former oboe teacher and associate dean of the College of Communication and Fine Arts, Dr. Raymond Lynch, is given annually to an outstanding oboist.

The Harold Streibich Award, established in memory of Att. Harold Streibich recognizes an outstanding Music Business student.

Belle Melodies Scholarship Award is sponsored by St. Mary's Episcopal School in support of a Recording Technology student.

Phi Kappa Lambda Academic Achievement Award is presented to the senior music student with the highest GPA.

**Excellence in Design Award** is given annually to an undergraduate architecture or interior design student selected by a vote of the faculty. Nominations are submitted from each architecture and interior design studio faculty member. Excellence in Design Award is given annually to a graduate architecture student selected by a vote of the faculty. Nominations are submitted from each architecture graduate design studio faculty member.

**ARCC Jonathan King Medal** is awarded annually to a graduating architecture or interior design student based upon nominations and a vote of the department faculty. The Architectural Research Centers Consortium offers one medal per school of architecture and design internationally. The medal acknowledges innovation, integrity, and scholarship in architectural and/or environmental design research.

Alpha Rho Chi Bronze Medal is awarded to the undergraduate architecture or interior design student whose academics, leadership, and service best represent the ideals of Alpha Rho Chi, the national co-ed fraternity for architecture and the allied arts, as voted upon by the department faculty. Winners need not be a member of APX but must have completed third year undergraduate classes.

**Creative Achievement Award** is given annually to the architecture or interior design student whose overall body of work best represents the Department of Architecture and its mission. Nominations are submitted and voted upon by the department faculty.

Graduate Thesis Award is presented to a Master of Architecture student in recognition of the most outstanding graduate thesis completed during the academic year. The award is based on a vote of the department faculty.

**Honors Thesis Award** is presented to a Bachelor of Fine Arts in Architecture or Bachelor of Fine Arts in Interior Design student in recognition of the most outstanding University Honors/Department of Architecture Honors thesis completed during the academic year. The award is based on a vote of the department faculty.

# **College of Education**

**Eleanor Mae Ferguson Award** is presented each year to the outstanding junior or senior woman Physical Education major who displays strong leadership, outstanding character, and high scholarship and who performs an active role in departmental and campus activities.

**Ralph Hatley Sr. Award** is presented to the outstanding junior or senior male Physical Education major who displays strong leadership, outstanding character, and high scholarship and who performs an active role in departmental and campus activities.

559

The Department of Health and Sport Sciences Outstanding Senior In Sport and Leisure Studies Award is presented annually in recognition of meritorious scholarship, leadership and service to the University, the community and the profession.

The Department of Health and Sport Sciences Outstanding Graduate Student Award is presented annually in recognition of meritorious scholarship, leadership and service to the University, the community and the profession.

The Department of Health and Sport Sciences Outstanding Senior In Health and Human Performance Award is presented annually in recognition of meritorious scholarship, leadership and service to the University, the community, and the profession.

The Department of Instruction and Curriculum Leadership Outstanding Senior Award is presented annually to an outstanding senior majoring in Special Education and Rehabilitation who displays strong leadership, outstanding character and scholarship and takes an active role in departmental and campus activities.

The Frank Dyer, Jr. Kappa Delta Pi Junior Academic Achievement Award is presented annually to the junior having the highest grade point average.

The John R. Petry Kappa Delta Pi Senior Academic Achievement Award is presented annually to the senior having the highest grade point average.

The Department of Consumer Science And Education Outstanding Senior Award is presented each year to the graduating senior in the department with the highest academic average.

The Marquita L. Irland Scholars Award is presented annually to a graduate with outstanding contributions in the areas of leadership, service to the community, to the profession of family and consumer sciences, and scholarship.

The Memphis Education Association Award is presented each year to the graduating senior who, having graduated from the Memphis City Schools System and completed all college level work in a teacher education program at the University, has attained the highest grade point average of the students in this category.

The Heber E. Rumble Outstanding Student Teacher Award is presented each year to the student whose performance in student teaching is judged to be the most outstanding.

The Department of Instruction and Curriculum Leadership Outstanding Early Childhood Major Award is presented annually to the Early Childhood Education major who has demonstrated outstanding scholarship, involvement in professional organizations, and professional potential.

The Department of Instruction and Curriculum Leadership Outstanding Elementary Education Major Award is presented annually to the Elementary Education major who has demonstrated outstanding scholarship, involvement in professional organizations, and professional potential.

The Department of Instruction and Curriculum Leadership Outstanding Master's Degree Candidate Award is presented to the master's candidate who has demonstrated outstanding scholarship, involvement in professional organizations, and professional integrity.

The Dean's Award is presented annually on the basis of scholarship, professionalism, leadership, and service to the College of Education, Health and Human Sciences, the University, and/or professional organizations.

## **Herff College of Engineering**

### The Herff College of Engineering Awards

**Outstanding Senior Awards** in the College of Engineering are presented to the outstanding senior, based on scholarship, in each of the following departments: Electrical Engineering, Mechanical Engineering, and Engineering Technology.

Outstanding Student Member of IEEE is presented an award by The Institute of Electrical and Electronics Engineers, student chapter.

The Thomas S. Fry Award is presented annually to the graduating Civil Engineering student who has demonstrated outstanding academic achievement.

The T. S. Wu Design Award is presented annually to the graduating Civil Engineering student who has demonstrated outstanding design capability throughout the curriculum.

560

Associated General Contractors Award is presented annually by the student chapter for outstanding achievement.

Fred H. Kellogg Award is presented annually to the outstanding student in Civil Engineering that is most likely to be an outstanding professional engineer.

Ashrae Award is presented annually to the outstanding junior in Mechanical Engineering.

Engineering Dean's Award is presented annually to the graduating student who has compiled the highest academic achievement in the college.

**Engineer-In-Training Award** is presented to the student who achieves the highest score on the Fundamentals of Engineering examination, which is the first step in becoming a registered engineer.

## Loewenberg College of Nursing

### The Loewenberg College of Nursing

### **Caring Award**

This award is given to a student who demonstrates attributes of <u>caring</u>. Caring is defined as a human state, a moral imperative or ideal, an affect, an interpersonal relationship, and a nursing intervention.

#### **Diversity Award**

This award is given to a student who embodies the spirit of <u>diversity</u>. Diversity is defined as embracing the recognition, acceptance, and respect of human differences.

#### **Integrity Award**

This award is given to a student who demonstrates attributes of <u>integrity</u>. Integrity is defined as acting in accordance with an appropriate professional code of ethics and accepted standards of practice.

#### Leadership Award

This award is given to a student who demonstrates attributes of <u>leadership</u>. Leadership is defined as influencing the actions of individuals and organizations in order to achieve desired goals.

#### **Dean's Award**

This award is given to a student who demonstrates attributes of all four of the Loewenberg College of Nursing core values: <u>caring</u>, <u>diversity</u>, <u>integrity</u>, and <u>leadership</u>.

### **College of Professional & Liberal Studies**

### **College of Professional & Liberal Studies Awards**

**Distinguished Special Project Award** is presented to each student whose special project has been judged outstanding by the Faculty Council of College of Professional & Liberal Studies.

Faculty Council Award is presented to the graduating senior, each commencement, who has earned the highest overall grade point average.

**Dean's Award for Special Achievement** is given to honor College of Professional & Liberal Studies graduates who have demonstrated academic achievement, leadership, professional and/or social commitment, and determination to complete a baccalaureate program.

561

Academic Achievement Award is given to College of Professional & Liberal Studies baccalaureate graduates who have demonstrated academic excellence and scholarly potential.

Alma Bucovaz Award for Urban Studies in the College of Professional & Liberal Studies is presented to a junior or senior with an approved baccalaureate program that addresses urban problems and seeks to ameliorate urban needs.

Bornblum Judaic Studies Award is presented to students who have excelled in the study of Hebrew Language and/or Judaic Studies.

The Legal Research Award is given annually to the paralegal student demonstrating exceptional mastery of the principles of legal research and writing.

**Outstanding Distance Education Student Awards** are presented each year to the students (one undergraduate and one graduate) who, while taking courses away from the main campus, have demonstrated unusual commitment and scholarly endeavor in the pursuit of continuing their education. Consideration for the award may include grade point average, unusual family commitment, service to peers, ability to balance scholarly pursuit with work, family, and community service, and unusual service to U of M or Extended Programs.

**Outstanding Paralegal Student Award** presented to a student seeking a Bachelor of Professional Studies degree in Paralegal Services who has demonstrated academic achievement, leadership, professional and/or social commitment, and dedication to the paralegal profession and the university.

## **Department of Aerospace Studies**

### **Department of Aerospace Studies Awards**

The President's Award is presented annually to the senior AFROTC cadet who has demonstrated outstanding attributes of leadership and high moral character. Selection is made by AFROTC, with final approval by the university president.

Angel Of The Year Award is presented to the member of Angel Flight who has given the most in service to the campus and the community.

Arnold Of The Year Award is presented to the member of Arnold Air Society who has given the most in service to the campus and the community.

## **Department of Military Service**

### The Department of Military Service Awards

Soldier's Medal is awarded to cadets who distinguish themselves by an act of heroism at advanced camp.

ROTC Medal for Heroism is awarded to cadets who distinguish themselves by an act of heroism performed on or off campus.

The President's Award is presented annually to the U of M senior cadet who has demonstrated outstanding attributes of leadership and high moral character. Selection is made by the department chair with final approval by the University president.

George C. Marshall ROTC Award is presented annually to the U of M senior cadet who has demonstrated outstanding leadership and scholastic qualities.

**Hughes Trophy Award** is presented annually to the cadet who is recommended by the professor of military science and the dean as the most outstanding commissioned graduate based upon officer potential and academic leadership.

Pallas Athene Award is presented annually to the most outstanding graduating female cadet.

**National Defense Transportation Association Award** is presented annually to the most outstanding senior cadet who is recommended by the professor of military science and the dean as being in the top twenty five percent of the ROTC and academic class and who possesses an interest in the Transportation Corps.

Armed Forces Communications Electronics Association Honor Award is presented to a senior cadet majoring in Math, Chemistry, Physics, Engineering, or Photography who is active on campus or academically distinguished and has demonstrated outstanding qualities of military leadership and high moral character.

562

Alden Patridge Commemorative Award is presented to the top graduating Science or Engineering student in the Army ROTC program.

**Distinguished Military Student/Graduate Award** is presented annually to senior cadets who are in the upper third of the ROTC class and upper half of the University class who are active on campus, are outstanding leaders, and possess an aptitude for military service.

**Department of the Army Superior Cadet Decoration Award** is presented annually to outstanding junior and senior cadets who have demonstrated academic leader qualities in scholastic and related activities and officer potential, and who are in the top twenty five percent of their ROTC and academic class.

American Legion General Military Excellence Award is presented annually to the outstanding cadet who has demonstrated qualities in military leadership, discipline, character, and citizenship, and is in the top twenty five percent of ROTC and academic class.

American Legion Scholastic Excellence Award is presented annually to the outstanding junior and senior cadets who have demonstrated qualities in leadership and actively participated in student activities. and who are in the top twenty five percent of their ROTC class and the top ten percent of their academic class.

Society of American Military Engineers Award is presented annually to the junior and senior cadets who are recommended by the professor of military science and the Dean as being in the top twenty five percent of the ROTC and academic class and the outstanding Engineering students of the year.

Association of the United States Army Award is presented to the junior who contributes the most, through leadership, to advancing the standing of the Military Science Department while in the top twenty five percent of the ROTC class and top ten percent of the academic class.

American Defense Preparedness Award is presented annually to the junior cadet who demonstrated outstanding leader qualities and participated actively in campus activities, placed in the top twenty percent of the platoon at Advanced Camp, received a B or above in all ROTC classes, and is in the upper half of the academic class.

Armed Forces Communications Electronics Association Scholarship Award is presented to Basic Course students accepted to the Advanced Course who are of high moral character, in the top twenty five percent of their academic class, and in need of financial assistance in completing a degree in Electrical Engineering or Technical Photography.

**Daughters of the Founders and Patriots of America Award** is presented annually to a freshman or sophomore cadet who is in the top twenty five percent of the ROTC class and has demonstrated excellence in history, the potential for good leadership, and related accomplishments reflecting the ideals of patriotism.

## **Department of Naval Science**

### The Department of Naval Science Awards

Trident Honor Society Award is presented to outstanding Naval midshipmen who have demonstrated the highest caliber of academic excellence.

### **NROTC** Awards

**President's Award** is presented annually by the University president to a graduating senior who demonstrates outstanding attributes of leadership and high moral character.

**Navy League of Memphis Honor Sword Award** is presented to the Naval Graduate selected as the one Midshipman of the graduating class who has consistently demonstrated the highest leadership ability throughout the program.

**Reserve Officers Association** is presented annually to the outstanding freshman, sophomore, junior, and senior who have demonstrated above average scholastic achievements, exceptional mastery of previous Naval Science courses, and superior potential for commissioned service.

The Retired Officers Association Award is presented to the outstanding junior who has demonstrated above average scholastic achievement, high moral character and exceptional potential for military leadership.

American Defense Preparedness Association Award is presented annually to an outstanding senior whose scholastic achievements are in the top half of the class and in the top one-fifth of NROTC enrollment at the University, who has shown active participation in athletics or campus activities and demonstrated outstanding leadership qualities.

563

Society of the War of 1812 Award is presented annually to an outstanding sophomore whose scholastic average is within the upper quarter of the class, and who demonstrates the ideals of Americanism.

Sons of the American Revolution Medal is presented annually to an outstanding freshman who has demonstrated leadership, military bearing and all around excellence in NROTC program studies and activities.

National Sojourners Award for Americanism is presented annually to a sophomore or junior who has demonstrated the ideals of Americanism, outstanding scholastic achievements and the potential to be an outstanding leader.

American Legion ROTC General Military Excellence Award is presented annually to one freshman, sophomore, and junior, each of whose scholastic achievements are in the top quarter of the class and who have demonstrated outstanding qualities in military leadership, discipline, character and citizenship.

American Legion ROTC Scholastic Excellence Award is presented annually to a freshman, sophomore, junior, and senior, each of whose scholastic achievements are in the upper ten percent of the University and who have demonstrated high qualities of military leadership.

Military Order of the World Wars Medal is presented to a freshman, sophomore, junior, and senior who each have demonstrated marked improvement in military scholastic achievements.

Veterans of Foreign Wars Award is presented annually to a freshman, sophomore, junior and senior who each have demonstrated achievement and concentrated effort in Naval Science and academic subjects and demonstrated capability and diligence in the Naval ROTC program.

**Daughters of the American Revolution Award** is presented annually to a graduating senior whose scholastic achievements are in the top quarter of the class and who has demonstrated qualities of dependability, good character, adherence to military discipline, leadership ability and a fundamental and patriotic understanding of the importance of the ROTC program.

**Daughters of the American Revolution Certificate** is presented annually to a junior who best exemplifies the qualities of dependability, good character, adherence to military discipline, leadership ability and a fundamental and patriotic understanding of the importance of the ROTC program.

**Daughters of Founders and Patriots of America Award** is presented annually to an outstanding sophomore or freshman who demonstrates qualities of dependability, good character, discipline, leadership, and patriotism.

Military Order of Foreign Wars Medal is presented annually to an outstanding freshman, sophomore, and junior who each have demonstrated discipline, good character, and leadership ability.

American Veterans of World War II, Korea, and Vietnam Medal is presented annually to an outstanding freshman with superior standing in military and academic subjects.

**Naval Institute Leadership Award** is presented annually to a graduating College Program student, Officer Candidate, and Marine Enlisted Commissioning and Education Program student who each have demonstrated outstanding potential for Naval leadership.

General Dynamics Award is presented annually to a Midshipman, Officer Candidate, and Marine Enlisted Commissioning and Education Program student who each have demonstrated outstanding leadership ability.

Armed Forces Communications and Electronic Association Award is presented to Midshipmen of good moral character, who are in the top fourth of their class, working toward a degree in electronics, communications, electrical engineering, mathematics, computer technology or intelligence systems, and who need financial assistance.

Armed Forces Communications and Electronic Association Honor Certificate is presented annually to a junior who has demonstrated high achievement in leadership and in academics and is academically strong in electronics, communications, electrical engineering, mathematics, computer technology or intelligence systems.

Naval Submarine League Award is presented annually to the graduating senior who has demonstrated superior leadership ability and academic aptitude for entry into the Submarine Warfare Community.

Marine Corps Association Award is presented annually to the graduating Marine-option Midshipman or Marine who best exemplifies the leadership qualities and professionalism of a Marine officer.

564 Mariner of the Year is presented annually by the Naval Science Department to a member of the Mariners who has given most in service to the department, University, and community.

# **Notice to Students**

# **Catalog Applicability:**

The UofM catalog is made available electronically by the University of Memphis. Requirements in this catalog are valid for students whose initial enrollment occurs Fall 2020-Summer 2021. This catalog is valid through Summer 2027. The University of Memphis (UofM) reserves the right to cancel or alter any part of this catalog without notice (subject to the following): The course offerings and requirements of the University of Memphis are continually under examination and revision. This catalog presents the offerings and requirements in effect at the time of publication, but is no guarantee that they will not be changed or revoked. The specific courses or activities constituting the degree requirements for any programs are subject to state contractual terms and does not constitute a contract between the student and the UofM.

UofM reserves the right to make changes as required in course offerings, curricula, academic policies and other rules and regulations affecting students to be effective whenever determined by the institution. These changes will govern current and formerly enrolled students. Enrollment of all students is subject to these conditions. Any fees, charges or costs, and all academic regulations set forth in this catalog are subject to change at any time, and all courses, programs, and activities described in this catalog are subject to cancellation or termination by the UofM at any time.

## **Degree/Major:**

A student may complete the requirements for the initial degree under the provisions of any valid UofM Catalog provided the effective date of that catalog is not earlier than the student's initial admission to UofM or some other accredited institution of higher learning. The degree requirements published in the Undergraduate Catalog of the University of Memphis are valid for seven years from the beginning of the academic year to which the catalog applies.

With the approval of the dean of the college through which the student's degree is offered, any student who had completed at least fifteen semester hours of course work and whose progress was interrupted by a call to active military duty may extend the validity date for graduation for any Catalog valid at the time of the call to active duty. Though the student should attempt to complete requirements within the normal seven-year validity period, the dean may grant an extension commensurate with actual time served on active military duty and time required for directly related medical treatment that prevents the student's re-enrollment. Qualification for this extension is contingent upon re-enrollment within a period of time deemed reasonable by the dean. The extension is not allowed for a full military career.

The seven-year catalog validity period applies only to degree requirements as specified in Graduation from the University and Colleges, Degree Programs and Courses-Undergraduate sections of the catalog. It does not apply to regulations in the Academic Regulations section. Specific regulations apply for the year in which they appear in the catalog.

## **Degree Awarded:**

After a degree has been awarded, the academic record (to include the transcript of all courses that comprises the awarded degree) is considered final and locked. Repeat processing, dropping of individual courses, withdrawals for a term, and any other adjustments to the final academic record will not be considered. Only administrative errors can be corrected on the final transcript after the degree has been awarded. Any academic record concerns that a student has during their final semester must be discussed with their graduation analyst prior to graduation.

# **University General Education Requirements**

General Education Requirements for all Undergraduate Degree Programs

The general education core at the University of Memphis is designed to ensure that college students have the broad knowledge and skills to become lifelong learners in an ever-changing global community. Because courses in general education should emphasize breadth, they should not be reduced in design to the skills, techniques, or procedures associated with a specific occupation or profession. Courses in this 41 hour core are distributed over the following disciplines:

## **Baccalaureate Degrees**\*

Communication	9 hours
Humanities / Fine Arts	9 hours (At least one course must be in literature.)
Social / Behavioral Sciences	6 hours
History#	6 hours
Natural Sciences	8 hours
Mathematics	3 hours
Total	41 hours

Courses designated to fulfill general education at the University of Memphis can be found at University General Education Program . A listing of courses that fulfill general education requirements across many Tennessee institutions is available at https://www.tbr.edu/academics/transfer-and-articulation.

\*Foreign language courses are an additional requirement for the Bachelor of Arts (B.A.) degrees. The B.A. degree requires proficiency in a foreign language equivalent to completion of two years of college-level work.

Six hours of English Composition and three hours in English oral presentational communication are required.

#Students who have not completed one year of American History in high school must complete 6 credit hours of American History or 3 credit hours of American History plus 3 credit hours of Tennessee History in order to satisfy the History General Education requirement. Students who plan to transfer to University of Tennessee System universities or to out-of-state or private universities should check requirements and take the appropriate courses.

Although courses that fulfill the requirements of general education subject categories vary, transfer of the courses is assured through the following means:

- Upon completion of an associate's degree designed for transfer at a regionally accredited college or university (A.A. or A.S.), the requirements of the lower-division general education core will be complete and accepted by the University of Memphis in the transfer process.
- If an A.A. or A.S. is not obtained, transfer of general education courses will be based upon fulfillment of complete subject categories. (Example: If all eight hours in the category of Natural Sciences are complete, then this "block" of the general education core is complete.) When a subject category is incomplete, course-by-course evaluation will be conducted.
- Institutional/departmental requirements of the grade of "C" will be honored. Even if credit is granted for a course, any specific requirements for the grade of "C" by the receiving institution will be enforced.
- In certain majors, specific courses must be taken also in general education. It is important that students and advisors be aware of any major requirements that must be fulfilled under lower-division general education.

## Transferability

The University of Memphis is committed to helping our students succeed, and with that comes a commitment to seamless transferability. Under the Tennessee Board of Regents (TBR) system, transfer equivalences were established among many Tennessee Higher Education Council institutions to ensure transferability across all Tennessee Board of Regents institutions. These were assured not just through the recognition of common General Education courses, but through a common agreement about the "blocks" or numbers of credits in each General Education category with common The online catalog can be accessed at: http://catalog.memphis.edu/index.php

learning outcomes. The University of Memphis plans to retain the blocks from the Tennessee Board of Regents general education program in order to maintain transferability with our community college and locally governed institutions (LGI) partners as far as possible and will make every effort to find equivalences within our program for general education courses taken at accredited institutions within Tennessee and beyond.

567

## **Philosophy of General Education**

The University of Memphis' general education core ensures that college students have the broad knowledge and skills to become lifelong learners in an ever-changing global community. Because courses in general education should emphasize breadth, they should not be reduced in design to the skills, techniques, or procedures associated with a specific occupation or profession.

General education provides the critical thinking skills necessary to seek truths, to discover answers to questions, and to solve problems. More specifically, the general education program develops students' abilities to become thoughtful readers and effective communicators who recognize their place in the history, culture, and diverse heritages. They appreciate the web of commonality of all humans in a multicultural world and are prepared for the responsibilities of an engaged citizenship. They recognize the ethical demands of our common lives. They demonstrate an ability to use the skills and knowledge of the social and behavioral sciences to analyze their contemporary world. They are familiar with the history and aesthetics of the fine arts. They understand and practice the scientific and mathematical view of the world.

Finally, the University of Memphis's general education core provides students with the means to flourish as human beings. A college education doesn't just enable one to make a better living. It also enables its citizens to make a better life for both individual and community.

### **Characteristics of General Education Courses**

The General education component is based on a coherent rationale.

General education courses are college level.

- In order to promote intellectual inquiry, general education courses present a breadth of knowledge, not focusing on skills, techniques, and procedures specific to the student's occupation or profession, and are drawn from specific academic areas.
- The general education component constitutes a minimum number of semester hours, or its equivalent, and comprises a substantial component of each undergraduate degree."

# Planning

## **Degree Program and Planning**

Each student is responsible for fulfilling all of the requirements for the degree program being pursued and for following the procedures and regulations as stated in the Catalog in effect when entering college. The catalog is valid for seven years. Students should keep a copy of the catalog they enter under until they graduate from The University of Memphis. Assistance from an advisor is helpful in planning the program of studies and in selecting the specific courses to be taken for each semester.

Graduation from the university section of the catalog outlines the minimum university level degree requirements. Some colleges specify the exact manner in which the university level requirements must be met. In addition to these, the student must fulfill the college level requirements for the degree and the major requirements. If the admission or retention standards for a particular college or department differ from the university requirements, they will be listed in the college degree program description. If they do not, the university requirements apply. The guidelines below will be helpful in planning which program to follow.

Read the catalog to investigate what options are available.

- Consult with an academic advisor in the Academic Counseling Center and the colleges that offer majors which are of interest to you; Talk with the departmental faculty in these areas of interest.
- Take advantage of the counseling offerings of the Counseling, Tutoring and Testing (Testing, Career Counseling, Personal and Psychological Counseling, and the Educational Support Program).
- Become familiar with the Academic Regulations section of the catalog; determine the grades that are needed to insure retention and graduation as well as honors classifications in the university and in individual programs.
- If you are undecided about a major area, begin your program of studies with those courses required for all degrees.

#### After a major has been chosen:

Consult with your advisor to determine what procedures are necessary to declare a major;

- Read the entire section of the catalog that relates to the degree and major selected; note all degree requirements listed for the college such as the number of hours required within the college and outside the college and the number of upper division hours required; list all the University General Education Program Requirements required for the college or obtain a degree sheet from the college advisor; note the major requirements (when choices are allowed, be sure to consult with your major advisor);
- Plan your coursework semester by semester; try to complete all of your lower division courses (1000-2000) during your first two years; be sure to check for prerequisites before enrolling in any courses, especially upper division courses; take the courses in the proper sequence.

### **TN eCampus:**

The University of Memphis offers over 300 online courses through the TN eCampus initiative. When you enroll in a TN eCampus online course, you enroll as a University of Memphis student and your courses will appear on your transcript as University of Memphis courses. You can review general course syllabus at the TN eCampus course list site.

Please note not all courses listed are offered by the University of Memphis or satisfy degree requirements. You MUST check with your academic advisor to verify which courses are offered and if they will satisfy requirements for your particular academic program.

# **General Requirements & Graduation**

# **Apply For Graduation**

To receive a bachelor's degree from any of the colleges in the University, students must have an \*overall grade point average of at least 2.00. Courses designated to fulfill general education at the University of Memphis can be found at University General Education Program. All students are required to apply to graduate during the semester preceding the semester of graduation. The deadlines for the application to graduate are included on the Registrar's website. It is the responsibility of the student to ensure that this deadline is met.

## **Degree Awarded**

After a degree has been awarded, the academic record (to include the transcript of all courses that comprises the awarded degree) is considered final and locked. Repeat processing, dropping of individual courses, withdrawals for a term, and any other adjustments to the final academic record will not be considered. Only administrative errors can be corrected on the final transcript after the degree has been awarded. Any academic record concerns that a student has during their final semester must be discussed with their graduation analyst prior to graduation.

## **Graduation with Distinction**

Students who intend to achieve Graduation with Distinction must do the following:

Fulfill all University of Memphis graduation requirements.

Earn the following minimum grade point average on **both** their UofM and \*Overall GPA to achieve the listed designations:

3.2500-3.4999 Cum Laude

3.5000-3.7999 Magna Cum Laude

3.8000-4.0000 Summa Cum Laude

\*Overall GPA refers to the combination of the student's UofM GPA and the GPA from college level transfer courses that were posted prior to Spring 2015 and after Summer 2019. Transfer work posted during Summer 2015 through Summer 2019 is not counted in the Overall GPA per the Tennessee Board of Regents transfer policy and the academic catalogs for this time period.

The actual conferral of Graduation with Distinction cannot be made until the student's UofM and Overall GPA has been certified by the College/School. Transitional Academic Studies courses (DSP) are not considered in calculating eligibility for Graduation with Distinction. College level courses used to satisfy high school deficiencies will be considered in the computations to determine eligibility for Graduation with Distinction.

## **Residence Requirements**

A student will satisfy residence requirements for graduation by earning at least twenty-five (25) percent of credit hours required for the degree at the University of Memphis. At least thirty (30) of the final sixty (60) hours required for the degree must be completed at the University of Memphis. A student transferring credits from a two-year college or institution must complete, as a requirement for the baccalaureate degree, a minimum of sixty semester hours in an accredited senior institution.

In addition, the student must meet the residence requirements for the specific degree as established by the college or school in which it is offered. Exceptions to residence requirements can be authorized by the appropriate dean. Residence requirements for specific degrees within each college or school may be found in the Colleges and Degree Programs section. For more details, the student should inquire in the office of the dean of the appropriate college or school.

## **Requirements for Teacher Licensure**

An undergraduate student can be recommended for licensure to teach in Elementary Education (Grades K-5); Early Childhood Education (Grades PreK-3); or Special Education (Grades K-12); or Physical Education (Grades K-12), Art (Grades PreK-12), Music (Grades PreK-12) in the State of Tennessee by completing all degree requirements for that endorsement as outlined for the Bachelor of Science in Education in the COLLEGE OF EDUCATION DEGREE PROGRAMS section of this Catalog, or the College of Communication and Fine Arts for Art and Music.

A student in any of these programs must (1) file an application for admission to the Teacher Education Program in The College of Education; (2) fulfill the requirements and application procedures for the year-long Residency; (3) apply to graduate before the University deadline; (4) have an overall GPA of no less than 2.75 and a grade of "C" or above in each required course on their program of study; (5) pass all appropriate PRAXIS II licensure exams, and (6) fulfill all other graduation requirements listed under the TEACHER EDUCATION PROGRAMS: REQUIREMENTS section.

570

Graduate, special, and transfer students who wish to obtain a teacher's license should confer with the academic advisor in the College of Education, Room 202, Ball Hall on the main campus, or Room 220 in the Varnell-Jones Building at the University of Memphis, Lambuth Campus, concerning their individual requirements.

## **Second Bachelor's Degree**

All students who hold a baccalaureate degree from a regionally accredited institution of higher education, including the University of Memphis, may earn another bachelor's degree with a different title.

To earn the second bachelor's degree, the student must:

Complete any additional college requirements as determined by the office of the dean of the college granting the second baccalaureate degree. Complete all requirements for the major as determined by the department in which the second baccalaureate degree is sought.

Complete a minimum of 30 semester hours in residence.

Earn a minimum overall\* grade point average of 2.0.

\*The University Undergraduate Council (UUC) approved in 2018 for University of Memphis coursework and transfer coursework to count in the overall gpa and overall combined GPA effective Fall 2019. This policy change is a return to University of Memphis practice prior to Summer 2015.

\*Overall GPA refers to the combination of the student's UofM GPA and the GPA from college level transfer courses that were posted prior to Spring 2015 and after Summer 2019. Transfer work posted during Summer 2015 through Summer 2019 is not counted in the Overall GPA per the Tennessee Board of Regents transfer policy and the academic catalogs for this time period.

For New Transfer students admitted Fall 2019, transfer credit will count in the overall and overall combined GPA

For Readmitted students for Fall 2019, transfer credit taken since last attending the U of M will count in the overall and overall combined GPA. For Continuing students, transfer credit applied to Fall 2019 will count in the overall and the overall combined GPA.

Historically, overall gpa included University of Memphis work and transfer work posted through Spring 2015. Due to a change in the Tennessee Board of Regents (TBR) policy effective Summer 2015, transfer credit posted was reflected in earned hours, but no longer applied to the overall or to the overall combined gpa.

## **Second Major**

Two majors in the same degree may be pursued simultaneously or subsequently. If a student completes the requirements from a valid Catalog for an additional major for a degree previously earned at the University of Memphis, that major may be posted on the student's record if the student applies for the additional major through the appropriate dean's office.

## Minors

A student with a declared major may pursue any established minor described in this or any subsequent catalog. The selected minor must be different than the declared major and require approval of the degree granting college under which the student is graduating. The minimum of 18 credit hours for a minor is required. Some of the hours in the minor may also be included in the student's general education and degree requirements. There must be at least 9 hours at the upper division level. The GPA required for the minor is that of the degree granting college. Students must complete the coursework for the minor as described in the "Undergraduate Programs" section of the undergraduate catalog. The minor must be declared no later than graduation check-out time. All course requirements for the minor must be completed by the time of graduation.

Minors available are the following:

### **College of Arts and Sciences**

Aerospace Studies Minor African and African American Studies Minor Anthropology Minor Asian Studies Minor

**Biology Minor** Chemistry Minor **Classical Studies Minor** Cognitive Science Minor Computer Science Minor (21 hours) Criminology and Criminal Justice Minor Earth Sciences Minor Emergency Management Minor **English Minor** Environmental Studies Minor Healthcare and Society Minor History Minor Legal Thought and Liberal Arts Minor Mathematical Sciences Minor Military Science Minor Naval Sciences Minor Nonprofit Management Minor Philosophy Minor Physics Minor Political Science Minor Pre-Health Professions Minor Psychology Minor Public Administration Minor **Religious Studies Minor** Social Work Minor Sociology Minor Women's and Gender Studies Minor World Languages and Literatures Minor

#### **College of Education**

Applied Behavior Analysis Minor Educational Psychology & Research Minor

### Fogelman College of Business & Economics

Accounting Minor Banking and Financial Services Minor **Business Economics Minor Business Finance Minor** Business Information and Technology Minor Entrepreneurship Minor International and Global Studies Minor Management Minor Marketing Management Minor Pre-Professional Business Administration Minor Professional Selling Minor Project Management Minor Real Estate Minor Risk Management, Financial Planning and Insurance Minor Social Media Marketing Minor Supply Chain Management Minor Systems Testing Minor

### **College of Communication and Fine Arts**

Advertising Minor Communication Minor Dance Minor Graphic Design Minor Journalism Minor Music Minor Photography Minor Public Relations Minor Studio Arts Minor Theatre Minor

### Herff College of Engineering

Engineering Technology Minor

### Kemmons Wilson School of Hospitality and Resort Management

Culinary Arts Minor Hospitality and Resort Management Minor Food and Beverage Management Minor Pastry and Baking Minor Special Events and Catering Management Minor

### College of Professional & Liberal Studies

Alcohol and Drug Abuse Services Minor American Studies Minor Child Development Minor Community Action and Social Change Minor Legal Studies Minor Religion in Society Minor

**College of Health Sciences** Nutrition, Health & Wellness Minor

**School of Public Health** Public Health Minor

# **College of Arts and Sciences**

Abby Parrill-Baker, Ph.D., Dean Room 107, Scates Hall (901) 678-3067 www.memphis.edu/cas

### Purposes

The College of Arts and Sciences has three distinct functions within the framework of the University.

- Its primary function is to offer a strong liberal arts program designed to help the students prepare themselves for life in their own cultural setting by acquiring the means and desire to continue the processes of intellectual development and character formation throughout their lives. "The purpose of education," wrote John Stuart Mill, "is to make capable and cultivated human beings." "Education has for its object the formation of character," wrote Herbert Spencer. We believe that people are people, no matter what their careers, and that if we can help people to become more capable and sensible, they will have better careers and lives. It is our belief that the best preparation for any profession or vocation is a thorough foundation in those major fields of human interest, which are included in the humanities, the natural sciences, and the social sciences. A program of liberal studies at the University of Memphis aims to provide the students with a store of factual knowledge, to introduce them to varying sets of principles, to stimulate them to think about and evaluate facts and principles, and to encourage them to order their own affairs and those of their society with the talent, insight, and discrimination they develop.
- The College of Arts and Sciences offers this kind of education to the candidates for its own degrees, and to the students of other colleges of the University, all of whose degree plans call for courses in the arts and sciences.
- The college offers preparatory courses for students interested in careers in medicine, dentistry, nursing, teaching, law and other professions; specific pre-professional programs, designed to prepare students to qualify for admission to professional schools, are available.

### **Organization of the College**

The College of Arts and Sciences comprises the following departments and divisions: Aerospace Studies, Anthropology, Biological Sciences, Chemistry, Computer Science, Earth Sciences, English, History, Mathematical Sciences, Military Science, Naval Science, Philosophy, Physics and Materials Science, Political Science, Psychology, the School of Urban Affairs and Public Policy (including City and Regional Planning, Criminology and Criminal Justice, Public and Nonprofit Administration, School of Social Work), Sociology, and World Languages and Literatures.

The various offerings of the departments and divisions of The College of Arts and Sciences are organized into four groups:

Humanities: English, history, philosophy, world languages and literatures.

Natural Sciences: biology, chemistry, computer science, earth science, mathematics, physics.

Social Sciences: anthropology, city and regional planning, criminal justice, economics, geography, political science, psychology, public administration, social work, sociology.

Other: African and African American Studies, Environmental Studies, International and Global Studies, Judaic Studies, Legal Thought and Liberal Arts, ROTC programs (Aerospace Studies, Military Science, Naval Science), Women's and Gender Studies.

College and Degree Requirements

Prior Learning Assessment

### **Academic Advising**

Students with declared majors in the College of Arts and Sciences receive advising from faculty or professional advisors in the department of their major. Through required advising appointments, the advisor assists students in selecting courses and fulfilling requirements in a timely and organized manner with attention to their prior skills. The advisor may also serve as a resource for discovering and pursuing academic and career goals, and for information about university support services available to students. This assistance, however, does not in any way relieve the student of the primary responsibility for studying the Catalog and fulfilling all the requirements for the degree.

## **Pre-Professional Training**

**Pre-Health** - The Pre-Professional Advisor located in Scates Hall, provides career and academic planning advisement to students pursuing admission to professional school in a healthcare field. Completion of prerequisite coursework, gaining clinical experience, preparation for entrance exams, and establishing a timeline to apply are among the topics covered. Pre-Health students should still meet with their assigned academic advisor to discuss major and degree planning.

**Pre-Law** - In general, accredited law schools have not adopted specific requirements for pre-law education; they do emphasize, however, certain courses as being conducive to the development of the broad cultural background necessary for the successful study of law. Students interested in applying to law school should contact the Pre-Professional Advisor in room 107, Scates Hall for further information.

**Teacher Preparation** - Students who wish to prepare for teaching careers in the secondary schools (grades 7-12) of Tennessee will be expected to complete a baccalaureate degree with a major in the intended teaching area, followed by earning licensure through the College of Education or other licensure programs. Additional information on licensure requirements may be obtained from the Office of Teacher Education in the College of Education.

Individual program requirements described in the University of Memphis Undergraduate Catalog are subject to change. Please consult the college level advisor for changes that may occur before the publication of the next issue of the catalog.

### **Department of Aerospace Studies**

The Department of Aerospace Studies provides a four-year program of instruction for all qualified U.S. citizens, male and female, divided into two phases, each of two years duration. The first, termed the General Military Course, offers instruction in the foundation of leadership and Aerospace-age citizenship. The second, termed the Professional Officer Course, builds upon these foundations in developing upperclassmen who are to become Air Force officers and serve on active duty upon graduation and commissioning.

Instruction in Aerospace Studies has been an important phase of the curriculum at the University of Memphis since 1951. Active duty Air Force personnel, approved by the University president, are detailed by the Department of the Air Force to administer the instructional program. Air Force officers serve under appointment by the University as Professor or Assistant Professor of Aerospace Studies.

## Leadership Laboratory

This lab is designed around a microcosm of the U.S. Air Force. It gives the cadets the opportunity to develop their leadership potential while allowing the staff to make evaluations based on actual managerial and leadership situations.

### **Aerospace Studies Minor**

### Requirements

Upon successful completion of 16 semester hours in Aerospace Studies with a minimum grade of C, a cadet may apply for a minor in Aerospace Studies.

## **Department of Anthropology**

Program objectives for a B.A. in Anthropology are that students will: (a) demonstrate knowledge of the holistic foundations of anthropology, and core subfields of cultural anthropology, biological anthropology, archaeology, and linguistics; (b) demonstrate critical analysis and independent thought in relation to core constructs, theories, and methods in anthropological works; (c) demonstrate effective written communication skills; and (d) experience and appreciate anthropology's real world applications through enriched learning opportunities such as community-based research, service learning, internships, and study-abroad programs.

### Anthropology, (B.A.)

Program objectives for a B.A. in anthropology are that students will: (a) demonstrate knowledge of the holistic foundations of anthropology, and core subfields of cultural anthropology, biological anthropology, archaeology, and linguistics; (b) demonstrate critical analysis and independent thought in relation to core constructs, theories, and methods in anthropological works; (c) demonstrate effective written communication skills; and (d) experience and appreciate anthropology's real world applications through enriched learning opportunities such as community-based research, service learning, internships, and study-abroad programs.

575

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

### College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

### The Major (30 hours)

Completion of 30 semester hours in anthropology courses including

ANTH 1100 - Biol Anth & Prehistory \*\* Credit Hours: (3) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ANTH 3200 - Culture and Change around the World Credit Hours: (3) ANTH 4065 - Anthropological Theory Credit Hours: (3) and 18 additional semester hours with at least 15 hours at the upper division level.

### Electives

Electives must be chosen to bring the total number of hours to 120.

### Honors Program

The Honors Program in Anthropology is open to anthropology majors only and requires (a) an inclusive grade point average of at least 3.00, (b) a cumulative grade point average of at least 3.25 in the major, (c) the completion of ANTH 4010 Ethnographic Methods ; (d) four honors courses in anthropology; (e) the completion of independent research (traditional or engaged scholarship) culminating in an original research thesis or creative work. Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred, "With Honors in Anthropology." Moreover, the student's diploma and the record at the University of Memphis will reflect this accomplishment. Admission to the Honors Program in Anthropology requires the completion of an application in which students must identify their specific research interests. See departmental advisor for more details.

### Typical 4-Year Anthropology Sequence

### Freshman Year

### **First Semester**

ANTH 1100 - Biol Anth & Prehistory \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* Foreign Language/BA Elective

### Second Semester

ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) Foreign Language/BA Humanities/Fine Arts\* Freshman Year Totals: 30-31 hrs.

### Sophomore Year

### **First Semester**

ANTH 3200 - Culture and Change around the World Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Natural Science\* (4) History\* Elective (3)

### Second Semester

History*
Elective
Fine Arts*
Natural Science*
UD Elective
Sophomore Year Totals: 32 hrs.

### Junior Year

### **First Semester**

UD ANTH (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Elective (3) UD Elective (3) UD ANTH (3)

### Second Semester

ANTH 4065 - Anthropological Theory Credit Hours: (3) UD ANTH (3) UD Elective (3) Elective (3) Elective (3) Junior Year Totals: 30 hrs.

### Senior Year

### **First Semester**

UD ANTH (3) UD Elective (3) Elective (3) Elective (3) UD Elective

### Second Semester

UD ANTH (3) ANTH Elective (3) UD elective (3) Elective (4) Senior Year Totals: 28 hrs.

Total Cumulative Hours Undergraduate: 120-121

# **Anthropology Minor**

# Requirements

Completion of 18 semester hours in anthropology courses, including

ANTH 1100 - Biol Anth & Prehistory \*\* Credit Hours: (3) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ANTH 3200 - Culture and Change around the World Credit Hours: (3) ANTH 4065 - Anthropological Theory Credit Hours: (3)

# Anthropology, (Accelerated B.A./M.A.)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Anthropology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Anthropology. Working with the undergraduate coordinator, those selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree requirements while also beginning their M.A. coursework.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Department of Anthropology. Each applicant will complete an interview with the graduate academic committee in the department. Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in anthropology. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Department of Anthropology's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in anthropology courses including

ANTH 1100 - Biol Anth & Prehistory \*\* Credit Hours: (3) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ANTH 3200 - Culture and Change around the World Credit Hours: (3) ANTH 4065 - Anthropological Theory Credit Hours: (3) and 18 additional semester hours with at least 15 hours at the upper division level. The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### Electives

#### Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Honors Program in Anthropology is open to anthropology majors only and requires (a) an inclusive grade point average of at least 3.00, (b) a cumulative grade point average of at least 3.25 in the major, (c) the completion of ANTH 4010 Ethnographic Methods; (d) four honors courses in anthropology; (e) the completion of independent research (traditional or engaged scholarship) culminating in an original research thesis or creative work. Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred, "With Honors in Anthropology." Moreover, the student's diploma and the record at the University of Memphis will reflect this accomplishment. Admission to the Honors Program in Anthropology requires the completion of an application in which students must identify their specific research interests. See departmental advisor for more details.

# Typical 5 Year Accelerated Anthropology Sequence

### Freshman Year

**First Semester** 

ANTH 1100 - Biol Anth & Prehistory \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) Math\* Foreign Language/BA Elective

Second Semester

ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective Credits (3) Foreign Language/BA Humanities/Fine Arts\* Semester Totals 30-31 hrs.

### Sophomore Year

First Semester ANTH 3200 - Culture and Change around the World Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Natural Science\* (3) History\* Elective(3) (16 hours this semester)

#### Second Semester

COMM 2381 - Oral Communication \*\* Credit Hours: (3) History\* Elective Fine Arts\* Natural Science\* UD Elective (18 hours this semester) Semester Totals 34 hrs.

#### Junior Year

#### **First Semester**

UD ANTH (3) Elective (3) Elective (3) UD Elective (3) UD ANTH (3)

#### Second Semester

ANTH 4065 Anthropological Theory (3) UD ANTH (3) UD Elective (3) Elective Credits (3) Elective Credits (2) Semester Totals 32 hrs

### Senior Year

#### **First Semester**

UD ANTH (3) UD Elective (3) ANTH 7075 (3) ANTH 7985 (1) Elective (3) Grad Elective (3) Second Semester

UD ANTH (3) ANTH Elective (3) UD Elective (3) ANTH 7076 (3) Grad Elective (3) Semester Totals 31 hrs;

(24 for the BA degree, 13 hours MA level; 17 BA level)

### 5th Year MA Program

#### **First Semester**

ANTH 7200 (3) Grad Elective (3) Grad Elective (3) Grad Elective (3)

#### Second Semester

ANTH 7255 (3) ANTH 7985 (5) Grad Elective (3) Semester Totals 23 hrs.

# Total Hours Undergraduate: 123-124 Total Hours Required for Graduation: 120 Total Hours Graduate: 36

# **Department of Biological Sciences**

Students who earn a B.S. in Biology should attain the following objectives: (a) demonstrate knowledge and comprehension of the principles, concepts, and theories pertinent at each level of biological organization; (b) apply principles of biological classification to the diversity of life and recognize phylogenetic relationships among organisms; (c) demonstrate skills in analytical reasoning and problem solving; (e) function successfully in laboratory and field settings, including the use of basic equipment, techniques, and safety protocols; (f) access, evaluate, and utilize biological information in print and electronic formats; (g) effectively communicate scientific knowledge and experimental results in both oral and written formats; (h) compete successfully for admission to graduate and professional programs and for employment utilizing their academic training.

#### **Advanced Placement**

All students who have completed an Advanced Placement biology course in high school should request a score report be sent to University of Memphis Office of Admissions during the admission process and before enrolling in classes. See the Advanced Placement Table for additional information.

# Biology, (B.S.)

Students who earn a B.S. in Biology should attain the following objectives: (a) demonstrate knowledge and comprehension of the principles, concepts, and theories pertinent at each level of biological organization; (b) apply principles of biological classification to the diversity of life and recognize phylogenetic relationships among organisms; (c) demonstrate skills in analytical reasoning and problem solving; (e) function successfully in laboratory and field settings, including the use of basic equipment, techniques, and safety protocols; (f) access, evaluate, and utilize biological information in print and electronic formats; (g) effectively communicate scientific knowledge and experimental results in both oral and written formats; (h) compete successfully for admission to graduate and professional programs and for employment utilizing their academic training.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: Biology majors are also required to take either MATH 1830 or MATH 1910 and these courses will fulfill general education requirements.

Eight credit hours of natural science courses (two lectures with labs) are required for general education and can be fulfilled by the following courses that are required for the Biology major.

BIOL 1110 General Biology I BIOL 1111 General Biology I Lab BIOL 1120 General Biology II BIOL 1121 General Biol II Lab

# The Major (67-68 hours)

### Biology Requirements (18 hours):

BIOL 1110 - General Biology | Credit Hours: (3)

580

BIOL 1111 - General Biology | Lab Credit Hours: (1)

- BIOL 1120 General Biology II Credit Hours: (3) (fulfills general education requirements)
- BIOL 1121 General Biol II Lab Credit Hours: (1) (fulfills general education requirements)
- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 4100 Evolution Credit Hours: (3)

Additional Science and Math Requirements (27-28 hours):

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) (fulfills general education requirements) MATH 1910 - Calculus I \*\* Credit Hours: (4) (fulfills general education requirements) PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab | Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

18 Additional Upper Division Hours in BIOL Courses Approved by the Department Including One Organismal Diversity Course From Among:

BIOL 3050 - Ecology Credit Hours: (4)
BIOL 3200 - General Botany Credit Hours: (4)
BIOL 3620 - Comp Anatomy of Vertebrts Credit Hours: (5)
BIOL 4245 - Plant Systematics/Evolution Credit Hours: (4)
BIOL 4375 - Molec Biol/Parasite Credit Hours: (4)
BIOL 4640 - Ornithology Credit Hours: (4)
BIOL 4740 - Mammalogy Credit Hours: (4)
BIOL 4744 - Herpetology Credit Hours: (4)
BIOL 4900 - Entomology Credit Hours: (4)

PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

Plus One Additional Laboratory or Lecture/Laboratory Course

#### **Required Support Courses:**

Select courses from each of the following three areas for a total of 12 hours:

Science Ethics (one course):

PHIL 3512 - Science/Technology/Human Values Credit Hours: (3)

PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)

#### Upper Division Social Science (one course):

```
ANTH 3111 - Human Paleontology Credit Hours: (3)
ANTH 4111 - Evolution and Human Health Credit Hours: (3)
ANTH 4511 - Medical Anthropology Credit Hours: (3)
ANTH 4521 - Culture, Soc & Mental Health Credit Hours: (3)
ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3)
ANTH 4551 - Culture/Sex/Childbirth Credit Hours: (3)
ANTH 4571 - Race and Health Disparities Credit Hours: (3)
ECON 4740 - Health Care Economics Credit Hours: (3)
ESCI 4201 - Urbanization/Environment Credit Hours: (3)
ESCI 4251 - Environmental Hazards Credit Hours: (3)
ESCI 4252 - Global Environmental Change Credit Hours: (3)
POLS 4512 - Global Environmental Politics Credit Hours: (3)
PSYC 3306 - Physiological Psyc** Credit Hours: (3)
PSYC 3307 - Animal Behavior ** Credit Hours: (3)
PSYC 3507 - Alcohol/Drugs/Behavior ** Credit Hours: (4)
PSYC 3512 - Health Psychology ** Credit Hours: (4)
PSYC 4305 - Mind/Brain/Intelligence ** Credit Hours: (3)
SOCI 3401 - Social Inequality ** Credit Hours: (3)
SOCI 3432 - Sociology of Gender ** Credit Hours: (3)
SOCI 4420 - Racial Inequality Credit Hours: (3)
SOCI 4541 - Sociology of Aging Credit Hours: (3)
SOCI 4851 - Medical Sociology Credit Hours: (3)
```

#### Skills Courses (two courses):

```
CLAS 3021 - Medical Terminology Credit Hours: (3)

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

or

COMP 4001 - Intro to Python Programming Credit Hours: (3)

ENGL 3601 - Technical and Profess Writing ** Credit Hours: (3)

ESCI 4511 - Remote Sensing/Environ Credit Hours: (3)

ESCI 4515 - Geographic Info Science Credit Hours: (3)

HLSC 4530 - Epidemiology ** Credit Hours: (3)

MATH 4611 - Intro Applied Statistics Credit Hours: (3)

or

PSYC 3010 - Research and Statistics I ** Credit Hours: (4)

PSYC 3020 - Research and Statistics II ** Credit Hours: (4)

or
```

Foreign Language: 6 hours in a single foreign language, or equivalent. If the language chosen was used to meet University admissions requirements, students must take the foreign language placement exam and complete two sequential courses beginning with the course into which placed by the exam. If a different language is chosen, any six hours will fulfill the requirement.

### Electives

Electives must be chosen to bring the total number of hours to 120.

# Notes:

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the major, the minor, and in all required chemistry, physics, and mathematical courses. BIOL, CHEM, MATH, and PHYS courses applicable toward the major or minor may not be taken more than three times.

583

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements.

# Typical 4-Year Biology Sequence

#### Freshman Year

```
First Semester
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
ENGL 1010 - English Composition** Credit Hours: (3)
MATH 1830 - Elementary Calculus** Credit Hours: (3)
or
MATH 1910 - Calculus | ** Credit Hours: (4)
Social Sciences (3) *
```

#### Second Semester

```
BIOL 1110 - General Biology I Credit Hours: (3)
BIOL 1111 - General Biology I Lab Credit Hours: (1)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
Humanities (3) *
```

Semester Totals 27-28 hrs

#### Sophomore Year

#### First Semester

BIOL 1120 - General Biology II Credit Hours: (3) BIOL 1121 - General Biol II Lab Credit Hours: (1) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Social Sciences (3) \* History (3) \*

#### Second Semester

BIOL 3130 - Cell Biology Credit Hours: (3)
CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1)
CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3)
ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
Elective (3)
Skills Course (3-4)

#### Semester Totals 33-34 hrs

#### Junior Year

First Semester BIOL 3072 - Genetics Credit Hours: (3) BIOL 3073 - Genetics Laboratory Credit Hours: (1) PHYS (4) UD BIOL (3) (Undergraduate research is strongly encouraged as part of BIOL elective hours) Skills Course (3-4)

#### Second Semester

BIOL 4100 - Evolution Credit Hours: (3) PHYS (4) UD BIOL (4) Humanities (3) \*

#### Semester Totals 28-29 hrs

#### Senior Year

#### **First Semester**

Science Ethics (3) UD BIOL (4) UD BIOL (3) Elective (3) Elective (3) Second Semester

```
History (3) *
UD BIOL (4)
UD Social Science (3)
Elective (3)
Elective (1-3)
```

#### Semester Totals 32 hrs

# Total Hours Required for Graduation with B.S. (120-123)

\*Must satisfy University General Education Program Requirement.

\*\*Courses offered only online or both online and on-ground

# **Biology Minor**

# Requirements

Completion of 18 semester hours in biology courses including

BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1)
BIOL 1120 - General Biology || Credit Hours: (3)
BIOL 1121 - General Biol || Lab Credit Hours: (1)
10 upper division hours

### Note

No more than four total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward minor requirements.

No more than four total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward minor requirements.

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the minor.

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

# **Biology**, (Accelerated B.S./M.S.)

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Biology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Biological Sciences.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Biology department. Each applicant will complete an interview with the graduate academic coordinator in biology.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in biology. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the Biological Sciences department's M.S. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: Biology majors are also required to take either MATH 1830 or MATH 1910 and these courses will fulfill general education requirements.

Eight credit hours of natural science courses (two lectures with labs) are required for general education and can be fulfilled by the following courses that are required for the Biology major.

BIOL 1110 General Biology I BIOL 1111 General Biology I Lab BIOL 1120 General Biology II BIOL 1121 General Biol II Lab

# The Major (67-68 hours)

# Biology Requirements (18 hours):

BIOL 1110 - General Biology I Credit Hours: (3)

BIOL 1111 - General Biology | Lab Credit Hours: (1)

- BIOL 1120 General Biology II Credit Hours: (3) (fulfills general education requirements)
- BIOL 1121 General Biol II Lab Credit Hours: (1) (fulfills general education requirements)
- BIOL 3072 Genetics Credit Hours: (3)
- BIOL 3073 Genetics Laboratory Credit Hours: (1)
- BIOL 3130 Cell Biology Credit Hours: (3)
- BIOL 4100 Evolution Credit Hours: (3)

Additional Science and Math Requirements (27-28 hours):

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) (fulfills general education requirements) MATH 1910 - Calculus I \*\* Credit Hours: (4) (fulfills general education requirements) PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab | Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

18 Additional Upper Division Hours in BIOL Courses Approved by the Department Including One Organismal Diversity Course From Among:

BIOL 3050 - Ecology Credit Hours: (4)
BIOL 3200 - General Botany Credit Hours: (4)
BIOL 3620 - Comp Anatomy of Vertebrts Credit Hours: (5)
BIOL 4245 - Plant Systematics/Evolution Credit Hours: (4)
BIOL 4375 - Molec Biol/Parasite Credit Hours: (4)
BIOL 4640 - Ornithology Credit Hours: (4)
BIOL 4740 - Mammalogy Credit Hours: (4)
BIOL 4744 - Herpetology Credit Hours: (4)
BIOL 4900 - Entomology Credit Hours: (4)

PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

Plus One Additional Laboratory or Lecture/Laboratory Course

### **Required Support Courses:**

Select courses from each of the following three areas for a total of 12 hours:

Science Ethics (one course):

PHIL 3512 - Science/Technology/Human Values Credit Hours: (3)

PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)

#### Upper Division Social Science (one course):

```
ANTH 3111 - Human Paleontology Credit Hours: (3)
ANTH 4111 - Evolution and Human Health Credit Hours: (3)
ANTH 4511 - Medical Anthropology Credit Hours: (3)
ANTH 4521 - Culture, Soc & Mental Health Credit Hours: (3)
ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3)
ANTH 4551 - Culture/Sex/Childbirth Credit Hours: (3)
ANTH 4571 - Race and Health Disparities Credit Hours: (3)
ECON 4740 - Health Care Economics Credit Hours: (3)
ESCI 4201 - Urbanization/Environment Credit Hours: (3)
ESCI 4251 - Environmental Hazards Credit Hours: (3)
ESCI 4252 - Global Environmental Change Credit Hours: (3)
POLS 4512 - Global Environmental Politics Credit Hours: (3)
PSYC 3306 - Physiological Psyc** Credit Hours: (3)
PSYC 3307 - Animal Behavior ** Credit Hours: (3)
PSYC 3507 - Alcohol/Drugs/Behavior ** Credit Hours: (4)
PSYC 3512 - Health Psychology ** Credit Hours: (4)
PSYC 4305 - Mind/Brain/Intelligence ** Credit Hours: (3)
SOCI 3401 - Social Inequality ** Credit Hours: (3)
SOCI 3432 - Sociology of Gender ** Credit Hours: (3)
SOCI 4420 - Racial Inequality Credit Hours: (3)
SOCI 4541 - Sociology of Aging Credit Hours: (3)
SOCI 4851 - Medical Sociology Credit Hours: (3)
```

#### Skills Courses (two courses):

```
CLAS 3021 - Medical Terminology Credit Hours: (3)

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

or

COMP 4001 - Intro to Python Programming Credit Hours: (3)

ENGL 3601 - Technical and Profess Writing ** Credit Hours: (3)

ESCI 4511 - Remote Sensing/Environ Credit Hours: (3)

ESCI 4515 - Geographic Info Science Credit Hours: (3)

HLSC 4530 - Epidemiology ** Credit Hours: (3)

MATH 4611 - Intro Applied Statistics Credit Hours: (3)

or

PSYC 3010 - Research and Statistics I ** Credit Hours: (4)

PSYC 3020 - Research and Statistics II ** Credit Hours: (4)

or
```

Foreign Language: 6 hours in a single foreign language, or equivalent. If the language chosen was used to meet University admissions requirements, students must take the foreign language placement exam and complete two sequential courses beginning with the course into which placed by the exam. If a different language is chosen, any six hours will fulfill the requirement.

### Electives

Electives must be chosen to bring the total number of hours to 120.

# NOTES:

Students must earn a grade of at least C- in CHEM 1110 and CHEM 1111 before taking any biology courses.

Students must earn a grade of at least "C-" in all BIOL courses applied toward the major, the minor, and in all required chemistry, physics, and mathematical courses. BIOL, CHEM, MATH, and PHYS courses applicable toward the major or minor may not be taken more than three times.

588

Students must earn a grade of at least "C-" in BIOL 1110 / BIOL 1111 and BIOL 1120 / BIOL 1121, before enrolling in any upper division BIOL course.

Any BIOL course applicable toward the major or minor may be repeated once to earn a minimum grade of "C-." To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available in the Biology Advising and Resource Center.

A student may not attempt the same BIOL course more than three times, regardless of where it is taken. Courses cross-listed with BIOL (e.g., CHEM 4511, CHEM 4512, and CHEM 4501) also are subject to this course repetition policy.

No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements.

### Typical 5-Year Accelerated B.S./M.S. Program in Biology

#### Freshman Year

First Semester CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) ENGL 1010 - English Composition\*\* Credit Hours: (3)

MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) OR MATH 1910 - Calculus I \*\* Credit Hours: (4)

Gen Ed Humanities (3) Gen Ed Social Science \* (3) Semester Total 16-17 hrs

#### Second Semester

CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) BIOL 1110 - General Biology I Credit Hours: (3) BIOL 1111 - General Biology I Lab Credit Hours: (1) Gen Ed Social Science (3) Gen Ed Humanities (3) Semester Total 17 hrs

#### Sophomore Year

#### **First Semester**

BIOL 1120 - General Biology II Credit Hours: (3)
BIOL 1121 - General Biol II Lab Credit Hours: (1)
CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3)
CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Gen Ed History (3)
PHYS 2010 - General Physics I Credit Hours: (3)
PHYS 2011 - General Physics Lab I Credit Hours: (1)
Semester Totals 18 hrs.

#### Second Semester

BIOL 3130 - Cell Biology Credit Hours: (3) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Gen Ed History (3) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1) Semester Total 17 hrs

#### Junior Year

#### **First Semester**

BIOL 4000 - Research I Credit Hours: (1-3)
BIOL 4511 - BIOCHEMISTRY I Credit Hours: (3)
Elective (3)
UD Social Science (3)
Skills Course (3-4)
BIOL 4503 - Lab Tech In Biochem Credit Hours: (2)
Semester Total 15-18 hrs

#### Second Semester

BIOL 4512 - Biochemistry II Credit Hours: (3)
BIOL 3072 - Genetics Credit Hours: (3)
BIOL 3073 - Genetics Laboratory Credit Hours: (1)
BIOL 3500 - Micro I/Fundmntl Aspect Credit Hours: (3)
BIOL 3505 - Gen Microbiology Lab Credit Hours: (2)
UD Statistics as Skills Course (3-4)
Elective/BIOL 4001 (3)
Semester Totals 16-17 hrs.

#### Senior Year

#### **First Semester**

BIOL 4100 - Evolution Credit Hours: (3)
Science Ethics (3)
Grad Courses 7000 (2), 7092, ... (6)
Semester Totals 12 hrs.

#### Second Semester

Electives (6) Grad Courses 7004 (1), 7102 (2), 7092,... (6) Semester Totals 12 hrs.

### Grad Year

#### **First Semester**

BIOL 7200 Seminar (1) BIOL 7996 Thesis (3) Grad Electives (6) BIOL 7092 Research (2) Semester Totals 12 hrs.

#### Second Semester

BIOL 7600 Defense (1)

# Total hours for completion of B.S./M.S. (147-152)

\*Must satisfy University General Education Program Requirement.

\*\*Courses offered only online or both online and on-ground

# **Department of Chemistry**

The Department of Chemistry offers courses leading to the B.S. degree with a major in chemistry. The department also offers a program culminating in the professional degree of Bachelor of Science in Chemistry (B.S.Ch.). This program is designed to meet the requirements of the Committee on Professional Training of the American Chemical Society, and is undertaken primarily by students who desire to go directly to positions in the chemical industry, or to enroll for postgraduate study in chemistry.

# **Sequence of Courses**

Students who have an ACT MATH subscore earning placement into MATH 1720 or higher should enroll in CHEM 1110/CHEM 1111 if they plan to take more than one year of college chemistry, or plan to major in either a natural science or in biomedical, civil, mechanical, or electrical engineering. CHEM 1010/CHEM 1011 and CHEM 1020/CHEM 1021 are for students interested in the science of chemistry, but are not credited toward a major in chemistry, biology or physics. CHEM 1010/CHEM 1011 and CHEM 1020/CHEM 1021 may satisfy the General Education Natural Science requirements of other majors. CHEM 1010 may be taken as preparation by students of limited high school chemistry background whose curriculum requires CHEM 1110.

# **Advanced Placement**

Beginning students who have had previous high school training in chemistry are invited to apply for advanced placement.

# Laboratory Safety and Course Requirements

Laboratory safety is strictly practiced in the Department of Chemistry. Approved eye protection must be worn as required in all chemical laboratories. In addition, to ensure that students enrolled in laboratory courses learn the necessary safety information to safely participate in the laboratory course, all prerequisites and/or corequisites for all laboratory courses are strictly enforced. As a result, when a student enrolls in a laboratory course without prior completion of the necessary prerequisite or corequisite, the student will be dropped from the laboratory course. In addition, when a student simultaneously enrolls in a laboratory course and corequisite course, but subsequently drops or discontinues the corequisite course, the student will be dropped from the laboratory course. In the event any student fails to comply with any safety requirements of the Department of Chemistry, the department has the right to not allow the student to perform laboratory work, or to withdraw the student from the laboratory course, as appropriate.

The requirements listed below are for majors and minors for the Bachelor of Science degrees or for minors for the Bachelor of Arts degrees; for detailed requirements for the Bachelor of Science in Chemistry, a professional degree, see degree requirements described later in this section.

NOTE: Students must complete CHEM 1110/CHEM 1111, CHEM 1120/CHEM 1121 before enrolling in any upper division course applied toward the major or the minor.

# **Chemistry - Biochemistry Concentration, (B.S.)**

Program objectives for a B.S. in Chemistry and a B.S.Ch. in Chemistry are: (a) to have a satisfactory knowledge and comprehension of core concepts of analytical, organic, physical, inorganic and bioorganic chemistry; (b) to develop the ability to critically assess and solve problems relating to theoretical and practical aspects of chemistry; (c) to have satisfactory laboratory skills; (d) to have satisfactory presentation skills to communicate

chemical concepts and the results of investigations into chemical phenomena, through oral and written discourse and by way of mathematical sciences (e) to have satisfactory basic computer and computational skills; (f) will be satisfactorily prepared for entry level positions in the field, or for admission to graduate or professional school; (g) to demonstrate an understanding of professional ethics and the importance of chemistry in its impact on society.

591

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Chemistry, B.S. Major:

### Mathematics:

```
MATH 1910 - Calculus | ** Credit Hours: (4)
```

#### Natural Science:

```
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
```

```
The Major (46-47 hours)
```

# **General Education (12 hours)**

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) Natural Science: CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

### Core Requirements (31 hours):

CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3) CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) CHEM 4999 - Senior Survey Credit Hours: (1) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) or PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab I Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1)

Plus One of the Following Upper Division Ethics Courses: PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)

### **Biochemistry Concentration (22 hours)**

MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) MATH 4611 - Intro Applied Statistics Credit Hours: (3) CHEM 4511 - Biochemistry | Credit Hours: (3) CHEM 4501 - Lab Tech In Biochem Credit Hours: (2) BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1) BIOL 1120 - General Biology || Credit Hours: (3) BIOL 1121 - General Biol || Lab Credit Hours: (1)

#### Plus one of the Following Courses:

CHEM 4512 - Biochemistry II Credit Hours: (3) BIOL 3500 - Micro I/Fundmntl Aspect Credit Hours: (3) BIOL 3130 - Cell Biology Credit Hours: (3)

and three (3) additional upper division hours in CHEM.

### NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grad e of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

### Electives

#### Electives must be chosen to bring the total number of hours to 120.

# Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.
- The student must present his/her research to an audience external to the Department of Chemistry.

# Typical 4-Year Chemistry (B.S.) Sequence, Biochemistry Concentration

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) or MATH 1910 - Calculus I \*\* Credit Hours: (4) ACAD 1100 - Academic Strategies Credit Hours: (3) Humanities/Fine Arts\* (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) BIOL 1110 - General Biology I Credit Hours: (3) BIOL 1111 - General Biology I Lab Credit Hours: (1) Social/Behavioral Sci\* (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

```
CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3)
CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1)
Humanities/Fine Arts* (3)
PHYS 2010 - General Physics I Credit Hours: (3) <sup>SC</sup>
PHYS 2011 - General Physics Lab I Credit Hours: (1) <sup>SC</sup>
BIOL 1120 - General Biology II Credit Hours: (3)
BIOL 1121 - General Biol II Lab Credit Hours: (1)
CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1)
CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
PHYS 2020 - General Physics II Credit Hours: (3) <sup>SC</sup>
PHYS 2021 - General Physics Lab II Credit Hours: (1) <sup>SC</sup>
Social/Behavioral Sciences* (3)
```

or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) Elective (3) MATH 4611 - Intro Applied Statistics Credit Hours: (3) History\* (3) CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) Elective (3) Ethics (3) (One of the following may be selected: PHIL 3512, PHIL 3514, PHIL 3515) History\* (3)

#### Semester Totals 29 hrs

#### Senior Year

CHEM 4501 - Lab Tech In Biochem Credit Hours: (2) CHEM 4511 - Biochemistry I Credit Hours: (3) Elective (3) Elective (3) CHEM 4999 - Senior Survey Credit Hours: (1) UD CHEM (3) UD BIOL (3) (Only one of BIOL 3130, BIOL 3500 or CHEM 4512 is required.) UD Elective (3) UD Elective (3) Elective (2)

#### Semester Totals 29 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

SC PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 may be substituted for this sequence

# **Chemistry - Biochemistry Concentration, (B.S.Ch.)**

The department also offers a program culminating in the professional degree of Bachelor of Science in Chemistry (B.S.Ch.). This program is designed to meet the requirements of the Committee on Professional Training of the American Chemical Society, and is undertaken primarily by students who desire to go directly to positions in the chemical industry, or to enroll for postgraduate study in chemistry.

# University General Education Program (41 hours)

See Graduation from the University link for the University General Education Program requirements.

To qualify for the Bachelor of Science in Chemistry degree, the student must complete a minimum of 120 semester hours with a grade point average of at least 2.0. A minimum of 42 semester hours must be in courses from the upper division.

Note: The following courses meet general education requirements as well as degree requirements for the B.S. Ch.

Natural Science: CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry || Credit Hours: (3) CHEM 1121 - General Chemistry || Lab Credit Hours: (1)

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

(These courses must be successfully completed prior to enrolling in Core Requirement courses)

### The Major (64 hours)

#### **General Education (12 hours)**

**Natural Science:** 

CHEM 1110 - General Chemistry | Credit Hours: (3)

CHEM 1111 - General Chemistry I Lab Credit Hours: (1)

CHEM 1120 - General Chemistry II Credit Hours: (3)

CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Core Requirements (35 hours)

CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3)

CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2)

CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3)

CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1)

CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3)

CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3)

CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3)

CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1)

CHEM 4999 - Senior Survey Credit Hours: (1)

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PS

PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PS

PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

MATH 1920 - Calculus II\*\* Credit Hours: (4)

Plus one of the Following Upper Division Ethics Courses: PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)

Biochemistry Concentration (13 hours) BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1) BIOL 1120 - General Biology || Credit Hours: (3) BIOL 1121 - General Biol || Lab Credit Hours: (1) CHEM 4511 - Biochemistry | Credit Hours: (3) CHEM 4501 - Lab Tech In Biochem Credit Hours: (2)

#### **Additional Lectures and Lab**

Six (6) additional upper division hours in chemistry lecture courses, one additional upper division chemistry laboratory course and: CHEM 4901 - Chemical Research I Credit Hours: (1) CHEM 4902 - Chemical Research II Credit Hours: (1) CHEM 4903 - Chemical Research III Credit Hours: (1)

Choose one of the Following 2 Courses: MATH 4611 - Intro Applied Statistics Credit Hours: (3) MATH 4635 - Intro Probability Theory Credit Hours: (3)

Choose one of the Following 3 Courses: BIOL 3130 - Cell Biology Credit Hours: (3) BIOL 3500 - Micro I/Fundmntl Aspect Credit Hours: (3) CHEM 4512 - Biochemistry II Credit Hours: (3)

#### Electives

# Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.

The student must present his/her research to an audience external to the Department of Chemistry.

# Typical 4-year Chemistry (B.S.Ch. Biochemistry Concentration)

#### Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) MATH 1910 - Calculus | \*\* Credit Hours: (4) ACAD 1100 - Academic Strategies Credit Hours: (3) Humanities/Fine Arts (3) Semester Total: 17 hours

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1)
Semester Total: 15 hours

Freshman Year Totals: 32 hours

#### Sophomore Year

#### First Semester

CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) BIOL 1120 - General Biology II Credit Hours: (3) BIOL 1121 - General Biol II Lab Credit Hours: (1) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) <sup>PS</sup> PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) <sup>PS</sup> COMM 2381 - Oral Communication \*\* Credit Hours: (3) Semester Total: 15 hours

#### Second Semester

CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) <sup>PS</sup> PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) <sup>PS</sup> Social/Behavioral Sciences (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Semester Total: 14 hours

Sophomore Year Totals: 29 hours

Junior Year

**First Semester** 

```
CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2)
CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3)
MATH (3) (from MATH 4611 or MATH 4635)
Humanities/Fine Arts (3)*
History (3)*
Semester Total: 14 hours
```

### Second Semester

```
CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3)
CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3)
Social/Behavioral Science (3)*
Ethics (3) (one from PHIL 3512, PHIL 3514, PHIL 3515)
History (3)*
Semester Total: 15 hours
```

Junior Year Totals: 29 hours

Senior Year

**First Semester** 

```
CHEM 4501 - Lab Tech In Biochem Credit Hours: (2)
CHEM 4511 - Biochemistry I Credit Hours: (3)
CHEM 4901 - Chemical Research I Credit Hours: (1)
CHEM 4902 - Chemical Research II Credit Hours: (1)
Elective (3)
Elective (3)
CHEM UD (3)
Semester Total: 16 hours
```

### Second Semester

```
CHEM 4903 - Chemical Research III Credit Hours: (1)
UD CHEM lab (1)
CHEM UD (3)
```

Senior Year Totals: 31 hours

### Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010 / PHYS 2011 and PHYS 2020 /PHYS 2021 may be substituted for this sequence.

# **Chemistry - General Concentration, (B.S.)**

Program objectives for a B.S. in Chemistry and a B.S.Ch. in Chemistry are: (a) to have a satisfactory knowledge and comprehension of core concepts of analytical, organic, physical, inorganic and bioorganic chemistry; (b) to develop the ability to critically assess and solve problems relating to theoretical and practical aspects of chemistry; (c) to have satisfactory laboratory skills; (d) to have satisfactory presentation skills to communicate chemical concepts and the results of investigations into chemical phenomena, through oral and written discourse and by way of mathematical sciences (e) to have satisfactory basic computer and computational skills; (f) will be satisfactorily prepared for entry level positions in the field, or for admission to graduate or professional school; (g) to demonstrate an understanding of professional ethics and the importance of chemistry in its impact on society.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Chemistry, B.S. Major:

# Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

The Major (46-47 hours)

# **General Education (12 hours)**

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) Natural Science: CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

### Core Requirements (31 hours):

CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3) CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) CHEM 4999 - Senior Survey Credit Hours: (1) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab I Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1) Plus One of the Following Upper Division Ethics Courses:

PHIL 3512 - Science/Technology/Human Values Credit Hours: (3)

PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3)

PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)

# General Concentration (15-16 hours)

Choose eight (8) upper division semester hours in chemistry from the following (not to include more than three credit hours of experiential learning):

CHEM 4901 - Chemical Research | Credit Hours: (1) CHEM 4902 - Chemical Research || Credit Hours: (1) CHEM 4903 - Chemical Research ||| Credit Hours: (1) CHEM 4916 - Teaching Chemistry Credit Hours: (1-3)

and MATH 1920 - Calculus II\*\* Credit Hours: (4)

### Plus one of the Following Courses:

MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 4611 - Intro Applied Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

# NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grade of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry Department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

600

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.

The student must present his/her research to an audience external to the Department of Chemistry.

# Typical 4-Year Chemistry (B.S.) Sequence, General Concentration

# Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
MATH 1910 - Calculus | ** Credit Hours: (4)
Humanities/Fine Arts* (3)
ACAD 1100 - Academic Strategies Credit Hours: (3)
```

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) MATH 1920 - Calculus II\*\* Credit Hours: (4) Social/Behavioral Sci\* (3)

### Semester Totals 31 hrs

### Sophomore Year

CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) Humanities/Fine Arts\* (3) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) <sup>PS</sup> COMM 2381 - Oral Communication \*\* Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) <sup>PS</sup> Social/Behavioral Science\* (3) Elective (3)

#### Semester Totals 31 hrs

#### Junior Year

```
CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2)
CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3)
MATH (3) (select from: MATH 2110, MATH 4611 OR COMP 1900)
History* (3)
Elective (3)
CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3)
PHIL 351X (3) (select from: PHIL 3512, 3514 OR 3515)
History* (3)
CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3)
Elective (3)
```

#### Semester Totals 29 hrs

### Senior Year

UD CHEM (4) Elective (3) Elective (2) UD elective (3) UD CHEM (4)

CHEM 4999 - Senior Survey Credit Hours: (1) UD elective (3) UD Elective (3) UD elective (3) Elective (3)

### Semester Totals 29 hrs

# Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011and PHYS 2020/PHYS 2021 may be substituted for this sequence.

# **Chemistry - General Concentration, (B.S.Ch.)**

The department offers a program culminating in the professional degree of Bachelor of Science in Chemistry (B.S.Ch.). This program is designed to meet the requirements of the Committee on Professional Training of the American Chemical Society, and is undertaken primarily by students who desire to go directly to positions in the chemical industry, or to enroll for postgraduate study in chemistry.

602

# University General Education Program (41 hours)

See Graduation from the University link for the University General Education Program requirements.

To qualify for the Bachelor of Science in Chemistry degree, the student must complete a minimum of 120 semester hours with a grade point average of at least 2.0. A minimum of 42 semester hours must be in courses from the upper division.

Note: The following courses meet general education requirements as well as degree requirements for the B.S. Ch.

#### **Natural Science:**

```
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
CHEM 1120 - General Chemistry || Credit Hours: (3)
CHEM 1121 - General Chemistry || Lab Credit Hours: (1)
```

Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4) (These courses must be successfully completed prior to enrolling in Core Requirement courses)

The Major (64-66 hours)

# **General Education (12 hours)**

Natural Science: CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry || Credit Hours: (3) CHEM 1121 - General Chemistry || Lab Credit Hours: (1) Mathematics: MATH 1910 - Calculus | \*\* Credit Hours: (4)

Core Requirements (35 hours):

CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3) CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 4999 - Senior Survey Credit Hours: (1) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) <sup>PS</sup> PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) (strongly recommended)

MATH 1920 - Calculus II\*\* Credit Hours: (4)

Plus one of the Following Upper Division Ethics Courses: PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### Advanced Requirements (17-19 hours)

Nine (9 hrs) upper division semester in chemistry lecture courses, plus (2-3 hrs) in upper division chemistry laboratory courses, the undergraduate research course sequence (3 hrs) CHEM 4901/CHEM 4902/CHEM 4903

#### Plus one of the following courses (3-4 hrs):

MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 4611 - Intro Applied Statistics Credit Hours: (3) MATH 4635 - Intro Probability Theory Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an inclusive GPA of at least 3.25 and a cumulative GPA of at least 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.

The student must present his/her research to an audience external to the Department of Chemistry.

# Typical 4-Year Chemistry (B.S.Ch.) Sequence

### Freshman Year

#### First Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) MATH 1910 - Calculus | \*\* Credit Hours: (4) ACAD 1100 - Academic Strategies Credit Hours: (3) Humanities/Fine Arts (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) MATH 1920 - Calculus II\*\* Credit Hours: (4) Social/Behavioral Sci (3) \*

#### Semester Totals 31 hrs

### Sophomore Year

#### First Semester CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) Elective (3) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PS or PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PS

COMM 2381 - Oral Communication \*\* Credit Hours: (3)

#### Second Semester

Social/Behavioral Sci (3) \* CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PS PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) PS ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3)

#### Semester Totals 31 hrs

#### Junior Year

#### First Semester

```
CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2)
CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3)
MATH (3) (from MATH 2110, MATH 2120, MATH 4611, MATH 4635 or COMP 1900)
Humanities/Fine Arts (3) *
History (3) *
```

#### Second Semester

```
CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3)
CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3)
Elective (3)
Ethics (3) (One of the following may be selected: PHIL 3512, PHIL 3514, PHIL 3515)
History (3) *
```

#### Semester Totals 29 hrs

#### Senior Year

First Semester CHEM 4902 - Chemical Research II Credit Hours: (1) UD CHEM lab (1) UD CHEM (3) CHEM 4901 - Chemical Research I Credit Hours: (1) Elective (3) Elective (3) CHEM UD (3)

```
Second Semester
CHEM 4903 - Chemical Research III Credit Hours: (1)
```

UD CHEM lab (1) UD CHEM (3) CHEM 4999 - Senior Survey Credit Hours: (1) UD elective (3) UD Elective (3) Elective (2)

#### Semester Totals 29 hrs

### Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011 and PHYS 2020/PHYS 2021 may be substituted for this sequence.

# **Chemistry Minor**

# Requirements

Completion of 20 semester hours in chemistry courses, including

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) 12 semester hours selected from courses applicable to the chemistry major and including at least two chemistry laboratory courses.

# Chemistry, (Accelerated B.S./M.S.)

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Chemistry during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Chemistry.

Working with the undergraduate and graduate coordinators, those selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree requirements while also beginning their coursework their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Chemistry department. Each applicant will complete an interview with the graduate academic committee in Chemistry.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in Chemistry. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the Department of Chemistry's M.S. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

### The Major (46-47 hours)

# **General Education (12 hours)**

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) Natural Science: CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

#### Core Requirements (31 hours):

CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3) CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) CHEM 4999 - Senior Survey Credit Hours: (1) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab | Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3)

PHYS 2021 - General Physics Lab II Credit Hours: (1)

Plus One of the Following Upper Division Ethics Courses:

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3514 Biomedical Ethics \*\* Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)

#### General Concentration (15-16 hours)

CHEM 4901 - Chemical Research I Credit Hours: (1) CHEM 4902 - Chemical Research II Credit Hours: (1) CHEM 4903 - Chemical Research III Credit Hours: (1) CHEM 4916 - Teaching Chemistry Credit Hours: (1-3)

and MATH 1920 - Calculus II\*\* Credit Hours: (4) Plus one of the Following Courses: MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 4611 - Intro Applied Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

# NOTE:

Students must earn a grade of at least "C-" in all CHEM courses applied toward the major or minor, and in all required BIOL, PHYS, and MATH courses. Students must earn a grade of at least "C-" in CHEM 1110 and CHEM 1120 before enrolling in any upper-division CHEM course, and in CHEM 1111 and CHEM 1121 before enrolling in any upper-division CHEM laboratory course.

Any CHEM (or cross-listed) course may be repeated once at the student's option to earn a minimum grade of "C-." To repeat a CHEM (or crosslisted) course a second time, a student may apply for and receive special permission from the Chemistry Department. Application information is available in the Chemistry Department Office, Room 213, J.M. Smith Chemistry Building. No student may take a CHEM (or cross-listed) course more than three times in order to earn a minimum grade of "C-" without extraordinary departmental permission.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Graduating with Honors in Chemistry

Applies to both the B.S.Ch. and the B.S. with a major in Chemistry

- In order to graduate with Honors in Chemistry, the student must have an overall GPA of 3.25 and a GPA of 3.25 in all science and mathematics courses required for the major.
- The student must earn honors credit in a minimum of three 3-credit hour upper-division chemistry lecture courses if honors have not been previously earned in CHEM 1110/CHEM 1120, or in a minimum of two 3-credit hour upper-division chemistry lecture courses if honors have been previously earned in CHEM 1110/CHEM 1120. Honors may be contracted in courses not offering a formal Honors section. A minimum grade of B is required in order to earn honors credit.
- The student must successfully complete CHEM 4901/CHEM 4902/CHEM 4903 with a formal paper required in CHEM 4903 serving as the equivalent of an honors thesis.

The student must present his/her research to an audience external to the Department of Chemistry.

# Typical 5-Year Chemistry (B.S./M.S.) Sequence, General Concentration

#### Freshman Year

ENGL 1010 - English Composition\*\* **Credit Hours:** (3) CHEM 1110 - General Chemistry | **Credit Hours:** (3) CHEM 1111 - General Chemistry | Lab **Credit Hours:** (1) MATH 1910 - Calculus | \*\* **Credit Hours:** (4) Humanities/Fine Arts \* (3) ACAD 1100 - Academic Strategies **Credit Hours:** (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) MATH 1920 - Calculus II\*\* Credit Hours: (4) Social/Behavioral Sci\* (3) Semester Totals 31 hrs

#### Sophomore Year CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) Humanities/Fine Arts \* (3) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PS COMM 2381 - Oral Communication \*\* Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PS PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) Social/Behavioral Sci\* (3) Elective (3) Semester Totals: 31 hrs **Junior Year** CHEM 3201 - Foundation/Analytical CHEM lab Credit Hours: (2) CHEM 3211 - Foundations/Analytical CHEM Credit Hours: (3) MATH (3) (select from: MATH 2110, MATH 4611 OR COMP 1900) History\* (3) Elective (3) CHEM 3111 - Foundations/Inorganic CHEM Credit Hours: (3) PHIL 351X (select from: PHIL 3512, 3514 OR 3515) History\* (3)

CHEM 3411 - Foundations/Physical Chemistry Credit Hours: (3) Elective (3) Semester Totals 29 hrs

#### Senior Year

CHEM 6211 (3) CHEM 6311 (3) Elective (3) Elective (2) UD Elective (3) UD CHEM (4)

#### CHEM 4999 - Senior Survey Credit Hours: (1)

CHEM 8000 Elective (3) CHEM 8000 Elective (3) UD Elective (3) UD Elective (3) Elective (3) Semester Totals: 32 hrs

#### 5th Year M.S. Program

CHEM 6000 elective (3) CHEM 8000 elective (3) CHEM 8913 (1) CHEM 7911 (1) CHEM 8910 (1) Semester Totals 18 hrs

# Total Hours: 120

### Total Hours Required for Graduation: 120

# Total Hours Graduate Program: 30

# Total Hours Required for M.S.: 30

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>PS</sup>With permission of the Chair of the Chemistry Department, PHYS 2010/PHYS 2011 and PHYS 2020/PHYS 2021 may be substituted for this sequence.

# **Department of Computer Science**

The Department of Computer Science offers courses leading to a B.S. degree with a major in computer science with an optional concentration in either cybersecurity, data science, or artificial intelligence. The department also offers a minor in computer science. Our B.S. degree program is accredited by the Computing Accreditation Commission of the Accreditation Board for Engineering and Technology (CAC/ABET).

# **Computer Science, Artificial Intelligence Concentration (B.S.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

```
General Education (12 hours)
```

```
Mathematics:

MATH 1910 - Calculus I ** Credit Hours: (4)

Natural Science:

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)

PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)

and

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

or

CHEM 1110 - General Chemistry I Credit Hours: (3)

CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
```

```
and
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours
```

```
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
```

```
or
```

```
BIOL 1110 - General Biology | Credit Hours: (3)
```

BIOL 1111 - General Biology | Lab Credit Hours: (1) and
BIOL 1120 - General Biology || Credit Hours: (3)
BIOL 1121 - General Biol || Lab Credit Hours: (1)

**Core Requirement (51 hours)** 

In addition to the specific General Education courses listed above, majors are required to take the following courses: MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) COMP 3410 - Computer Org/Architecture Credit Hours: (4) COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP 4040 - Programming Languages Credit Hours: (3) COMP 4081 - Software Engineering Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3)

### Artificial Intelligence Concentration (12 hours)

COMP 4118 - Introduction to Data Mining Credit Hours: (3)

COMP 4720 - Intro Artificial Intelligence Credit Hours: (3)

COMP 4730 - Expert Systems Credit Hours: (3)

COMP 4741 - Intro to Neurocomputing Credit Hours: (3)

### Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

# Typical 4-Year Sequence for Artificial Intelligence Concentration

### Freshman Year

First Semester

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) MATH 1910 - Calculus I \*\* Credit Hours: (4) ENGL 1010 - English Composition\*\* Credit Hours: (3) Free Elective (3) Total: 15 hrs.

#### Second Semester

COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Gen Ed Social Science (3) Total: 14 hrs.

### Sophomore Year

First Semester

```
COMP 2700 - Discrete Structures Credit Hours: (4)
COMP 3410 - Computer Org/Architecture Credit Hours: (4)
Natural Science I with Lab (4)
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
OR
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
Total: 15 hrs.
```

#### Second Semester

```
COMP 3115 - Database Process and Design Credit Hours: (3)
MATH 4614 - Probability/Statistics Credit Hours: (3)
Natural Science II with Lab (4)
Gen. ed. history (3)
Free Elective (3)
Total: 16 hrs.
```

# Junior Year

#### First Semester

COMP 3825 - Network/Info Assurance Credit Hours: (3)
COMP 4030 - Design/Analysis Algorithms Credit Hours: (3)
COMP 4720 - Intro Artificial Intelligence Credit Hours: (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Gen Ed Humanities (3)
Total: 15 hrs.

#### Second Semester

COMP 4270 - Operating Systems Credit Hours: (3) COMP 4118 - Introduction to Data Mining Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) Gen Ed Social Science (3) Free Elective (3) *Total: 15 hrs.* 

### Senior Year

#### **First Semester**

COMP 4081 - Software Engineering Credit Hours: (3)
COMP 4601 - Models of Computation Credit Hours: (3)
Gen ed history (3)
Free Elective (3)
COMP 4741 - Intro to Neurocomputing Credit Hours: (3)
Total: 15 hrs.

#### Second Semester

COMP 4040 - Programming Languages Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3) COMP 4730 - Expert Systems Credit Hours: (3) Gen Ed Humanities (3) Free Elective (3) Total: 15 hrs.

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, Cybersecurity Concentration (B.S.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

#### **General Education (12 hours)**

```
Mathematics:

MATH 1910 - Calculus I ** Credit Hours: (4)

Natural Science:

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)

PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)

and

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)

PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
```

or

```
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
and
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
```

or

BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1) and
BIOL 1120 - General Biology || Credit Hours: (3)
BIOL 1121 - General Biol || Lab Credit Hours: (1)

#### **Core Requirement (51 hours)**

In addition to the specific General Education courses listed above, majors are required to take the following courses: MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) COMP 3410 - Computer Org/Architecture Credit Hours: (4) COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP 4040 - Programming Languages Credit Hours: (3) COMP 4081 - Software Engineering Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3)

# Cybersecurity Concentration (12 hours)

#### Completion of

COMP 4410 Computer Security COMP 4420 Wireless and Mobile Security COMP 4430 Digital Forensics and one COMP elective (3) which can be either COMP 4302 Web Service/Internet, or COMP 4310 Wireless Mobile Comp or COMP 4432 Secure Coding and Testing .

### Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

### Typical 4 Year Sequence Computer Science-Cybersecurity Concentration

#### Freshman Year

```
First Semester
COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)
COMP 1950 - Ethics and Technology Credit Hours: (1)
MATH 1910 - Calculus I ** Credit Hours: (4)
ENGL 1010 - English Composition** Credit Hours: (3)
Free elective (3)
Total: 15
```

#### Second Semester

COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Gen ed social science (3) Total: 14

#### Sophomore Year

First Semester COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3410 - Computer Org/Architecture Credit Hours: (4) Natural Science I w/lab (4) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Total: 15

#### Second Semester

COMP 3115 - Database Process and Design Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) Natural Science II w/lab (4) Gen ed history (3) Free elective (3) **Total: 16** 

### Junior Year

**First Semester** 

```
COMP 3825 - Network/Info Assurance Credit Hours: (3)
COMP 4030 - Design/Analysis Algorithms Credit Hours: (3)
COMP 4410 - Computer Security Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Gen ed humanities (3)
Total: 15
```

#### Second Semester

```
COMP 4270 - Operating Systems Credit Hours: (3)
MATH 3242 - Intro Linear Algebra Credit Hours: (3)
Gen ed social science (3)
Free elective (3)
Total: 15
```

### Senior Year

```
First Semester
COMP 4081 - Software Engineering Credit Hours: (3)
COMP 4601 - Models of Computation Credit Hours: (3)
COMP 4430 - Digital Forensics Credit Hours: 3
Gen ed history (3)
Free elective (3)
Total: 15
```

#### Second Semester

COMP 4040 - Programming Languages Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3) Cybersecurity elective (3) Gen ed humanities (3) Free elective (3) Total: 15

## Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, Data Science Concentration (B.S.)**

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

General Education (12 hours) Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) Natural Science: PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) and PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) or CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) and

CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

or

BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1) and
BIOL 1120 - General Biology || Credit Hours: (3)
BIOL 1121 - General Biol || Lab Credit Hours: (1)

**Core Requirement (51 hours)** 

In addition to the specific General Education courses listed above, majors are required to take the following courses:

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) COMP 3410 - Computer Org/Architecture Credit Hours: (4) COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP 4040 - Programming Languages Credit Hours: (3) COMP 4081 - Software Engineering Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3)

# Data Science Concentration (12 hours)

Completion of

COMP 4151 Intro to Data Science COMP 4745 Intro to Machine Learning MATH 4685 Statistical Learning I MATH 4686 Statistical Learning II

### Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

# Typical 4-Year Sequence for Data Science Concentration

### Freshman Year

#### **First Semester**

```
COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)
COMP 1950 - Ethics and Technology Credit Hours: (1)
MATH 1910 - Calculus I ** Credit Hours: (4)
ENGL 1010 - English Composition** Credit Hours: (3)
Free Elective (3)
Total hrs. 15
```

#### Second Semester

COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Gen Ed Social Science (3) Total hrs. 14

#### Sophomore Year

```
First Semester
COMP 2700 - Discrete Structures Credit Hours: (4)
COMP 3410 - Computer Org/Architecture Credit Hours: (4)
Natural Science I with Lab (4)
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
OR
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
Total hrs. 15
```

#### Second Semester

```
COMP 3115 - Database Process and Design Credit Hours: (3)
MATH 4614 - Probability/Statistics Credit Hours: (3)
Natural Science II with Lab (4)
General Ed History (3)
Free Elective (3)
Total hrs 16
```

### Junior Year

```
First Semester
COMP 3825 - Network/Info Assurance Credit Hours: (3)
COMP 4030 - Design/Analysis Algorithms Credit Hours: (3)
COMP 4151 - Intro to Data Science Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Gen Ed Humanities (3)
Total hrs. 15
```

Second Semester COMP 4270 - Operating Systems Credit Hours: (3) COMP 4745 - Intro to Machine Learning Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) Gen Ed Social Science (3) Free Elective (3) Total hrs. 15

#### Senior Year

**First Semester** 

COMP 4081 - Software Engineering Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) MATH 4685 - Statistical Learning I Credit Hours: (3) Gen Ed history (3) Free elective (3) Total hrs 15

Second Semester

COMP 4040 - Programming Languages Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3) MATH 4686 - Statistical Learning II Credit Hours: (3) Gen Ed humanities (3) Free elective (3) Total hrs 15

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science, General Concentration (B.S.)**

The Department of Computer Science offers courses leading to a B.S. degree with a major in computer science with an optional concentration in either cybersecurity, data science, or artificial intelligence. The department also offers a minor in computer science. Our B.S. degree program is accredited by the Computing Accreditation Commission of the Accreditation Board for Engineering and Technology (CAC/ABET).

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

**General Education (12 hours)** 

```
Mathematics:
MATH 1910 - Calculus I ** Credit Hours: (4)
Natural Science:
PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
and
```

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
or
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
and
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
or
BIOL 1110 - General Biology I Credit Hours: (3)
BIOL 1111 - General Biology I Lab Credit Hours: (1)

BIOL 1121 - General Biol II Lab Credit Hours: (1)

BIOL 1120 - General Biology II Credit Hours: (3)

#### **Core Requirement (51 hours)**

In addition to the specific General Education courses listed above, majors are required to take the following courses:

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) COMP 3410 - Computer Org/Architecture Credit Hours: (4) COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP 4040 - Programming Languages Credit Hours: (3) COMP 4081 - Software Engineering Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3)

# General Concentration (12 hours)

Completion of four upper-division COMP electives, which may not be any of 1000, 1100, 1800, 3050, 4001, or 4014

Note: Seniors are required to take the Computer Science Field Test the last semester before they graduate.

### Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

# **Computer Science Honors Designation**

A student will earn the designation "with Honors in Computer Science" upon graduation having complied with the following requirements:

Be admitted into the Computer Science Honors Program by the Department upon formal request for consideration by the student; Have a cumulative GPA of at least 3.0 and a GPA of at least 3.60 in Computer Science (COMP) courses satisfying degree requirements; Complete fifteen (15) credit hours in courses designated "Honors" in the the Computer Science program and satisfying degree requirements; The online catalog can be accessed at: http://catalog.memphis.edu/index.php Take honors sections of both COMP 1900 and COMP 2150 (core sequence);

Take at least three (3) credit hours from the following courses as honors sections: COMP 4882 Capstone Project, COMP 4901 Independent Study, COMP 4980 Senior Thesis.

# Typical 4 Year Sequence Computer Science-General Concentration

### Freshman Year

#### **First Semester**

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) MATH 1910 - Calculus I \*\* Credit Hours: (4) ENGL 1010 - English Composition\*\* Credit Hours: (3) Free elective (3) Total: 15

#### Second Semester

COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Gen ed social science (3) Total: 14

#### Sophomore Year

First Semester COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3410 - Computer Org/Architecture Credit Hours: (4) GE Natural Science I w/lab (4) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 Credits / Units: 3 Total: 15

### Second Semester

```
COMP 3115 - Database Process and Design Credit Hours: (3)
MATH 4614 - Probability/Statistics Credit Hours: (3)
Free Elective (3)
Gen Ed History (3)
Natural Science II w/lab (4)
Total: 16
```

#### Junior Year

First Semester COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Gen Ed Humanities (3) Total: 15

Second Semester COMP 4270 - Operating Systems Credit Hours: (3) COMP Elective (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) GE Social Science (3) Free Elective (3) Total: 15

### Senior Year

```
First Semester
COMP 4081 - Software Engineering Credit Hours: (3)
COMP 4601 - Models of Computation Credit Hours: (3)
COMP Elective (3)
Gen ed history (3)
Free elective (3)
Total: 15
```

#### Second Semester

COMP 4040 - Programming Languages Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3) COMP Elective (3) Gen ed humanities (3) Free elective (3) Total: 15

## Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Computer Science Minor (21 hours)**

Completion of 21 semester hours in computer science courses, including the following:

## **Minor Requirements**

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) and 6 additional upper division semester hours. Note: COMP 1000 COMP 1100 COMP 1800 COMP 3050 COMP 4001 COMP 4014 may **not** be used to fulfill the minor requirement.

# Computer Science, (Accelerated B.S./M.S.)

This 5-year program allows Computer Science majors begin the coursework for the M.S. degree early, counting up to 12 semester hours toward both B.S. and M.S. degrees.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Computer Science major: Mathematics - MATH 1910; Natural Science - PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 or CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, or BIOL 1110/BIOL 1111 and BIOL 1120/BIOL 1121; ECON 2020 is strongly recommended for the Social Science requirement.

# The Major (63 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) **Natural Science:** PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) and PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

or

```
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
    and
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
    or
```

BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1) and BIOL 1120 - General Biology II Credit Hours: (3) BIOL 1121 - General Biol II Lab Credit Hours: (1)

**Core Requirement (51 hours)** 

In addition to the specific General Education courses listed above, majors are required to take the following courses:

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4614 - Probability/Statistics Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 1950 - Ethics and Technology Credit Hours: (1) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 3115 - Database Process and Design Credit Hours: (3) COMP 3410 - Computer Org/Architecture Credit Hours: (4) COMP 3825 - Network/Info Assurance Credit Hours: (3) COMP 4030 - Design/Analysis Algorithms Credit Hours: (3) COMP 4040 - Programming Languages Credit Hours: (3) COMP 4081 - Software Engineering Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) COMP 4601 - Models of Computation Credit Hours: (3) COMP 4882 - Capstone Software Proj Credit Hours: (3)

# Concentration (12 hours)

Select Computer Science, General Concentration (B.S.), Computer Science, Artificial Intelligence Concentration (B.S.), Computer Science, Data Science Concentration (B.S.) or Computer Science, Cybersecurity Concentration (B.S.)

## Enrollment

Students who are within two semesters of earning the B.S. degree in Computer Science and have maintained an overall and COMP GPA of at least 3.0 may officially enroll in the program.

## B.S. degree requirement

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Students must satisfy the University General Education Program and The Major requirements as described above, with the graduate course substitutions detailed in part (1) of the M.S. degree requirement below.

After enrolled students earn the Computer Science, General Concentration (B.S.), Computer Science, Artificial Intelligence Concentration (B.S.), Computer Science, Data Science Concentration (B.S.) or Computer Science, Cybersecurity Concentration (B.S.), they must apply for full admission into the Graduate School and into the Master's Program in Computer Science. The GRE requirement will be waived for students who have maintained an overall and COMP GPA of at least 3.0 at the time of earning the B.S. degree.

622

# M.S. degree requirement

**1.** Complete 12 hours of graduate-level COMP courses to substitute for certain 3000/4000-level courses that are required by the COMP major. These 12 hours are counted toward both the B.S. and M.S. degrees.

At most 6 hours of these can be 6000-level courses. COMP 6001, 6005, 6014, 6030, 6040, 6270, 6601, 6901, and 6911 cannot be used for these 6 hours.

At least 6 hours of these must be 7000-level courses. Allowable substitutions are: COMP 7712 for 4030; 7212 for 4270; 7612 for 4601; 7327 for 4420; 7125 for 4430; 7720 for 4720; 7745 for 4745. Furthermore, any 7000-level course can substitute for a COMP elective.

2. Complete 21 semester hours of 7000-level courses, which must include at least 3 hours of COMP 7980 (Master's Project) or 7996 (Master's Thesis).

# Electives

#### Electives must be chosen to bring the total number of semester hours to 120.

Students should talk to their advisors to determine most suitable courses for them.

# **Computer Science Honors Designation**

A student will earn the designation "with Honors in Computer Science" upon graduation having complied with the following requirements:

Be admitted into the Computer Science Honors Program by the Department upon formal request for consideration by the student; Have a cumulative GPA of at least 3.0 and a GPA of at least 3.60 in Computer Science (COMP) courses satisfying degree requirements; Complete fifteen (15) credit hours in courses designated "Honors" in the the Computer Science program and satisfying degree requirements; Take honors sections of both COMP 1900 and COMP 2150 (core sequence);

Take at least three (3) credit hours from the following courses as honors sections: COMP 4882 Capstone Project, COMP 4901 Independent Study, COMP 4980 Senior Thesis.

# Total hours required for completion of the B.S. (120)

## Fifth Year (for Accelerated B.S./M.S.)

#### First Semester

COMP 7xxx (3) COMP 7xxx (3) COMP 7xxx (3) COMP 7xxx (3) Total hours 12

#### Second Semester

COMP 7980 (6)<sup>MP</sup> COMP 7xxx (3) COMP 7xxx (3) Total hours 12 <sup>MP</sup>Accelerated B.S./M.S. students have up to 6 semesters to complete COMP 7980 (Masters Project), after the Senior Year. In each semester, they must register for COMP 7980 for either 1 hour, 3 hours, or 6 hours.

623

# Total hours for completion of B.S./M.S. (141)

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Department of Criminology and Criminal Justice**

Program objectives for a B.A. in Criminology and Criminal Justice are: (a) exhibit an understanding of the important functions, organization, and fundamental concepts of the operation of the criminal justice system (police, law/courts, corrections) in a democratic society; (b) acquire knowledge of the development of the components of the criminal justice system from an historical and cross-cultural perspective; (c) know the major theorists and theoretical orientations that help explain criminal behavior; (d) be able to understand, analyze, and critically evaluate basic research and data relevant to crime and the criminal justice system; (e) demonstrate an ability to formulate a thesis and to gather and critically assess information appropriate to a topic under study; (f) have the ability to effectively communicate both in written and oral form; (g) have an understanding of career and educational options that a bachelor's degree in Criminology and Criminal Justice provides.

# Criminology and Criminal Justice, (B.A.)

Program objectives for a B.A. in Criminology and Criminal Justice are: (a) exhibit an understanding of the important functions, organization, and fundamental concepts of the operation of the criminal justice system (police, law/courts, corrections) in a democratic society; (b) acquire knowledge of the development of the components of the criminal justice system from an historical and cross-cultural perspective; (c) know the major theorists and theoretical orientations that help explain criminal behavior; (d) be able to understand, analyze, and critically evaluate basic research and data relevant to crime and the criminal justice system; (e) demonstrate an ability to formulate a thesis and to gather and critically assess information appropriate to a topic under study; (f) have the ability to effectively communicate both in written and oral form; (g) have an understanding of career and educational options that a bachelor's degree in Criminology and Criminal Justice provides.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (39 hours)

Completion of 39 semester hours including

CJUS 1100 - Intro/Criminal Justice \*\* Credit Hours: (3) either CJUS 2226 - Introduction to Police \*\* Credit Hours: (3) or CJUS 2326 - Introduction to Courts Credit Hours: (3) or CJUS 2426 - Intro/Corrections in America \*\* Credit Hours: (3) CJUS 3130 - Research Methods CJUS \*\* Credit Hours: (3) CJUS 3540 - Criminology Credit Hours: (3) CJUS 4110 - Senior Capstone in CJUS Credit Hours: (3) CJUS 4130 - Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3) an Upper Division English course plus 18 additional hours in criminology and criminal justice, of which at least 15 hours must be at the upper-division level.

#### Note

Students will be allowed no more than 6 hours of credit toward the degree in non-classroom courses such as internships and individual directed studies.

### Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

Majors who have completed at least 55 hours of coursework (with at least 9 hours in Criminology & Criminal Justice), have an inclusive grade point average of at least 3.25, and a cumulative GPA of at least a 3.25 in the major are invited to apply for admissions to the department's honors program. Students who are admitted must complete 15 hours of honors coursework in the Department, with at least 9 hours being upper-division criminal justice courses. Honor students must maintain a grade point average of at least 3.25. Students who complete the program and the regular college requirement will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Criminology and Criminal Justice." The student's diploma and the official record at The University of Memphis will also reflect this accomplishment.

# Typical 4-Year Criminology and Criminal Justice Sequence

### **Freshman Year**

```
CJUS 1100 - Intro/Criminal Justice ** Credit Hours: (3)
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
Foreign Language/B.A. (3)
Elective (3)
Elective (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
CJUS 2226 - Introduction to Police ** Credit Hours: (3)
CJUS 2326 - Introduction to Courts Credit Hours: (3)
CJUS 2426 - Intro/Corrections in America ** Credit Hours: (3)
Foreign Language/B.A. (3)
```

#### Semester Totals 30-31 hrs

Social/Behavioral Science (3) \*

#### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

CJUS LD elective (3) Humanities (3) \* Natural Science (4) \* History (3) \* Social/Behavioral Science (3) \* Elective (3) Natural Science (4) \* Fine Arts (3) \* CJUS 3130 - Research Methods CJUS \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

History (3) \* Elective (3) CJUS 3540 - Criminology **Credit Hours: (3)** CJUS UD elective (3) COMM 2381 - Oral Communication \*\* **Credit Hours: (3)** UD English (3) CJUS 4130 - Ethical Dilemmas in Criminology and Criminal Justice **Credit Hours: (3)** UD elective outside major (3) Elective (3) CJUS UD elective (3)

#### Semester Totals 30 hrs

### Senior Year

CJUS UD elective (3) CJUS UD elective (3) UD elective outside major (3) UD elective outside major (3) UD elective outside major (3)

Elective (3) CJUS 4110 - Senior Capstone in CJUS Credit Hours: (3) Elective outside major (4) CJUS UD elective (3)

Semester Totals 28 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Criminology and Criminal Justice Minor**

## Requirements

Completion of 18 hours in criminal justice courses including

```
CJUS 1100 - Intro/Criminal Justice ** Credit Hours: (3)
```

```
either
CJUS 2226 - Introduction to Police ** Credit Hours: (3)
or
```

CJUS 2326 - Introduction to Courts Credit Hours: (3) or
CJUS 2426 - Intro/Corrections in America \*\* Credit Hours: (3) and
CJUS 3130 - Research Methods CJUS \*\* Credit Hours: (3) and
CJUS 3540 - Criminology Credit Hours: (3)

and 6 additional upper-division hours in Criminology and Criminal Justice courses

# **Department of Earth Sciences**

Program objectives are: (a) be able to demonstrate an understanding of the fundamental principles, concepts and knowledge of the discipline Earth Sciences (b) have knowledge of the effects of natural processes and human activity on the environment; (c) be able to address, solve and communicate geographic problems using quantitative methods and geographic techniques; (d) be able to critically examine community problems and develop coherent solutions to urban and other land management issues; (e) demonstrate effective written, oral and visual communication skills.

# Earth Sciences, (B.A.)

Program objectives are: (a) be able to demonstrate an understanding of the fundamental principles, concepts and knowledge of the discipline Earth Sciences (b) have knowledge of the effects of natural processes and human activity on the environment; (c) be able to address, solve and communicate geographic problems using quantitative methods and geographic techniques; (d) be able to critically examine community problems and develop coherent solutions to urban and other land management issues; (e) demonstrate effective written, oral and visual communication skills.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (35-49 hours)

## Core Requirements (7 hours):

All students must take ESCI 1020 (4) and ESCI 4515 (3). In addition, all students must fulfill the requirements for one of the following concentrations:

### Concentration (28-42 hours):

#### Geoarchaeology (33 hours):

ESCI 1103 - The Human Planet Credit Hours: (4) ESCI 2301 - Fundamentals of Archaeology Credit Hours: (4) ESCI 4202 - Geomorphology Credit Hours: (4) ESCI 4301 - Archaeology of the Americas Credit Hours: (3) ESCI 4325 - Archaeol Fld/Lab Techn Credit Hours: (3) ESCI 4350 - Archaeology of Collapse Credit Hours: (3) ESCI 4352 - Archaeology/World Prehistory Credit Hours: (3) ESCI 4521 - Quantitative Methods Credit Hours: (3) and six upper division hours as approved by advisor.

#### Geography (28 hours):

ESCI 1010 - Weather and Climate Credit Hours: (4) or
ESCI 1050 - The Earth Through Time Credit Hours: (4) or
ESCI 1103 - The Human Planet Credit Hours: (4)
ESCI 1401 - Intro/Cultural Geography Credit Hours: (3) or
ESCI 4430 - Economic Geography Credit Hours: (3)
ESCI 1301 - Survey of World Regions Credit Hours: (3) or
ESCI 4307 - Thematic Studies/China Credit Hours: (3)
ESCI 4521 - Quantitative Methods Credit Hours: (3) and 15 additional upper division hours as approved by advisor.

#### Geology (41-42 hours):

ESCI 1040 - Physical Geology Credit Hours: (4) ESCI 1050 - The Earth Through Time Credit Hours: (4) ESCI 3311 - Mineralogy/Petrology Credit Hours: (4) ESCI 4512 - Structural Geology Credit Hours: (4) ESCI 3712 - Sedimentology/Stratighy Credit Hours: (4) ESCI 4622 - Geology Field Camp Credit Hours: (6) CHEM 1110 - General Chemistry | Credit Hours: (3) and CHEM 1111 - General Chemistry | Lab Credit Hours: (1) and CHEM 1120 - General Chemistry II Credit Hours: (3) and CHEM 1121 - General Chemistry II Lab Credit Hours: (1) PHYS 2010 - General Physics | Credit Hours: (3) and PHYS 2011 - General Physics Lab | Credit Hours: (1) and PHYS 2020 - General Physics II Credit Hours: (3) and PHYS 2021 - General Physics Lab II Credit Hours: (1)

MATH 1910 - Calculus I \*\* Credit Hours: (4) (taken as University General Education requirement) and 3-4 ESCI upper division hours approved by advisor.

# Electives (18-23 hours)

Electives may be chosen to bring the total number of hours to 120.

# Typical 4-Year Geoarchaeology Concentration Sequence

### Freshman Year

Humanities/Fine Arts (3) \*

MATH (3-4) \* ENGL 1010 - English Composition\*\* Credit Hours: (3) Elective (3) Foreign Language/B.A. (3) Elective (3) Elective (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social/Behavioral Science (3) \* Foreign Language/B.A. (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

ESCI 1020 - Landforms \*\* Credit Hours: (4) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* Fine Arts (3) \* Elective (3) ESCI 1103 - The Human Planet Credit Hours: (4) COMM 2381 - Oral Communication \*\* Credit Hours: (3) UD elective (2) History (3) \* Elective (3)

#### Semester Totals 31 hrs

### Junior Year

ESCI 2301 - Fundamentals of Archaeology Credit Hours: (4) ESCI 4515 - Geographic Info Science Credit Hours: (3) UD elective (3) Elective (3) History (3) \* ESCI 4325 - Archaeol Fld/Lab Techn Credit Hours: (3) UD ESCI (3) UD ESCI (3) Elective (3)

#### Semester Totals 31 hrs

#### Senior Year

Elective (3) ESCI 4301 - Archaeology of the Americas **Credit Hours:** (3) ESCI 4202 - Geomorphology **Credit Hours:** (4) UD ESCI (3) UD Elective (3) ESCI 4352 - Archaeology/World Prehistory **Credit Hours:** (3) ESCI 4350 - Archaeology of Collapse **Credit Hours:** (3) ESCI 4521 - Quantitative Methods **Credit Hours:** (3) Semester Totals 28 hrs

Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Typical 4-Year Geography Concentration Sequence

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
Humanities/Fine Arts (3) *
Foreign Language/B.A. (3)
Elective (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Elective (3)
Social/Behavioral Science (3) *
Foreign Language/B.A. (3)
Elective (3)
```

### Semester Totals 30-31 hrs

## Sophomore Year

```
Elective (3)
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
    or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
ESCI 1301 - Survey of World Regions Credit Hours: (3)
Fine Arts (3) *
ESCI 1010 - Weather and Climate Credit Hours: (4)
    or
ESCI 1050 - The Earth Through Time Credit Hours: (4)
    or
ESCI 1103 - The Human Planet Credit Hours: (4)
UD elective (3)
Elective (3)
ESCI 1020 - Landforms ** Credit Hours: (4)
History (3) *
COMM 2381 - Oral Communication ** Credit Hours: (3)
```

### Semester Totals 32 hrs

### Junior Year

ESCI 1401 - Intro/Cultural Geography Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php ESCI 4515 - Geographic Info Science Credit Hours: (3) UD ESCI (3) UD elective (3) Elective (3) History (3) \* UD ESCI (3) UD Elective (3) Elective (3) UD Elective (3)

### Semester Totals 30 hrs

# Senior Year

```
ESCI 4521 - Quantitative Methods Credit Hours: (3)
UD ESCI (3)
UD elective (3)
UD elective (3)
Elective (3)
UD ESCI (3)
UD ESCI (3)
UD elective (3)
Elective (4)
```

Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Typical 4-Year Geology Concentration Sequence

# Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
ESCI 1020 - Landforms ** Credit Hours: (4)
Elective (4)
Foreign Language/B.A. (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
ESCI 1040 - Physical Geology Credit Hours: (4)
MATH 1910 - Calculus I ** Credit Hours: (4)
Foreign Language/B.A. (3)
```

### Semester Totals 28 hrs

## Sophomore Year

ESCI 1050 - The Earth Through Time Credit Hours: (4)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Humanities/Fine Arts (3) \*
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
Fine Arts (3) \*
ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
ESCI 3311 - Mineralogy/Petrology Credit Hours: (4)

#### Semester Totals 28 hrs

### Junior Year

```
History (3) *
PHYS 2010 - General Physics | Credit Hours: (3)
PHYS 2011 - General Physics Lab | Credit Hours: (1)
ESCI 3712 - Sedimentology/Stratighy Credit Hours: (4)
UD Elective (3)
History (3) *
PHYS 2020 - General Physics || Credit Hours: (3)
PHYS 2021 - General Physics Lab || Credit Hours: (1)
ESCI 4512 - Structural Geology Credit Hours: (4)
Social/Behavioral Sciences (3) *
```

### Semester Totals 28 hrs

### Summer of Third or Fourth Year

ESCI 4622 - Geology Field Camp Credit Hours: (6) Summer Field Camp

### Senior Year

```
UD ESCI (4)
ESCI 4515 - Geographic Info Science Credit Hours: (3)
UD elective (3)
Social/Behavioral Sciences (3) *
Elective (3)
Elective (3)
UD elective (4)
UD elective (4)
UD elective (3)
```

### Semester Totals 30 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Earth Sciences Minor**

# Requirements

Completion of 18 semester hours in earth sciences courses, at least 9 of which must be upper division hours.

# **Department of English**

Program objectives for a B.A. in English are: (a) to develop skills in critical thinking, reading, and writing; (b) to have opportunities to consider the relationships among language, literature, culture, and writing; (c) to concentrate study of these interrelated areas in one of six endeavors, each with its own particular focus: African American literature, applied linguistics, creative writing, English as a second language, literature, and professional writing.

Note: Students should see the English advisor who will explain the advantages of the various concentrations and assist students in developing an appropriate program of study.

# English, (B.A.)

Program objectives for a B.A. in English are: (a) to develop skills in critical thinking, reading, and writing; (b) to have opportunities to consider the relationships among language, literature, culture, and writing; (c) to concentrate study of these interrelated areas in one of six endeavors, each with its own particular focus: African American literature, applied linguistics, creative writing, English as a second language, literature, and professional writing.

# University General Education Program (41 Hours)

See Graduation from the University for the University General Education Program requirements. English majors take ENGL 1010, ENGL 1020, and ENGL 2201 or ENGL 2202 to complete General Education Program Requirements and English Major requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

### The Major (33 hours in addition to University General Education Program)

ENGL 1010, 1020, and 2201 or 2202 or equivalents with a minimum grade of "C-" are prerequisites for all upper division (3000 and 4000-level) courses in the Department of English.

Major Core (12 hours) ENGL 3210 - British Lit to 1750 \*\* Credit Hours: (3) ENGL 3220 - British Lit since 1750 \*\* Credit Hours: (3) ENGL 3327 - American Literature to 1865 \*\* Credit Hours: (3)

#### One Course from the following:

Note: Creative Writing Concentration must select ENGL 4599, 4604, or 4605. Professional Writing Concentration and ESL-Licensure Track must select ENGL 3604 or ENGL 4602.

ENGL 3501 - Modern English Grammar \*\* Credit Hours: (3) ENGL 3511 - Intro to Linguistics \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) ENGL 3701 - Lit Criticism/Theory Credit Hours: (3) ENGL 4501 - History of English Lang Credit Hours: (3) ENGL 4599 - Forms of Creative Nonfiction Credit Hours: (3) ENGL 4602 - Adv Composition \*\* Credit Hours: (3) ENGL 4604 - Forms of Poetry Credit Hours: (3) ENGL 4605 - Forms of Fiction Credit Hours: (3)

### Concentrations (12 hours)

#### A concentration must be chosen from

English - African-American Literature Concentration, (B.A.)

English - Creative Writing Concentration, (B.A.)

English - English as a Second Language Concentration, (B.A.)

English - Language and Linguistics Concentration, (B.A.)

English - Literature Concentration, (B.A.)

English - Professional Writing Concentration, (B.A.)

#### Tracks

English - English as a Second Language Licensure Track, (B.A.)

### Note the Following:

Students should see the English advisor who will explain the advantages of the various concentrations and assist students in developing an appropriate program of study.

Courses taken to satisfy the core requirements may not be used to satisfy concentration requirements.

No more than a total of six (6) hours in ENGL 3100-3119, ENGL 4101-4110-ENGL 4109, and 3 hours in ENGL 4900 may be applied to the English major.

Students who wish to satisfy the requirements for both the English major and the endorsement to teach English in high school should consult the College of Education for licensure requirements.

ENGL 3500 and ENGL 3603 may not be used to satisfy any requirement for the English major.

ENGL 4900 and ENGL 4996 may not be used to satisfy required hours in any concentration.

## Electives (9 hours)

Nine hours of upper-division ENGL courses.

### Honors Program

Honors sections of English courses required to fulfill lower-division general education requirements (ENGL 1010, ENGL 1020, ENGL 2201, ENGL 2202) are open to qualified students enrolled in University Honors, regardless of their major. The Department of English also offers an honors program open only to English majors, who maintain an inclusive grade point average of at least 3.25 and a cumulative grade point average of at least 3.25 in all coursework counting toward the major. For a degree conferred "with Honors in English," students must take 12 hours of English Honors coursework as follows:

ENGL 4995 Honors Thesis Research ENGL 4996 Honors Thesis plus two additional upper-division English courses taken for Honors credit Details of the program are available at https://www.memphis.edu/english.

# Typical 4-Year English Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities (3) \* MATH (3-4) \* Foreign Language/B.A. (3) Elective (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) Fine Arts (3) \* Foreign Language/B.A. (3) Elective (3)

#### Totals 30-31 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History (3) \* Elective (3) Natural Science (4) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3)

ENGL 3210 - British Lit to 1750 \*\* Credit Hours: (3) History (3) \* Elective (3) Natural Science (4) \* ENGL Core Elective (3)

#### Semester Totals 32 hrs

### Junior Year

```
ENGL 3220 - British Lit since 1750 ** Credit Hours: (3)
ENGL concentration (3)
Social/Behavioral Science (3) *
Elective (3)
Elective (3)
```

ENGL 3327 - American Literature to 1865 \*\* Credit Hours: (3) ENGL concentration (3) Social/Behavioral Science (3) \* Elective (3) UD ENGL elective (3)

### Semester Totals 30 hrs

### Senior Year

UD ENGL elective (3)

ENGL concentration (3) UD elective (3) UD elective (3) Elective (3)

UD ENGL elective (3) ENGL concentration (3) UD elective (3) Elective (4)

Semester Totals 28 hrs

Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **English Minor**

# Requirements

Completion of 12 upper division hours in English (excluding ENGL 3500 and ENGL 3603).

# English, (Accelerated B.A./M.A)

This program allows outstanding undergraduate students to begin coursework for the Master of Arts in English during their senior year. Working with the Undergraduate Advisor and the Director of Graduate Studies, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit one reference letter to the English department. The letter should emphasize the student's ability to be successful in graduate-level coursework. Each applicant will complete an interview with the Director of Graduate Studies in English.

In the ABM Program, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Graduate coursework will not apply to undergraduate GPA.

To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the English department's M.A. program.

Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of English.

To get additional details about this program, consult the department advisor.

# **Department of History**

The Department of History introduces students to the richness and complexity of the human experience through a curriculum that covers all major geographic areas and time periods, and emphasizes both the unity of that experience and the diversity resulting from such factors as cultural, social, and gender differences. We seek to develop not only a knowledge of the past, but also an appreciation of history as an intellectual discipline that employs a wide variety of scholarly methodologies in its effort to understand that past. Students are taught to think and work as historians: to read critically and analytically both primary and secondary sources, to appreciate the complexity of historical issues and multiplicity of historical views, and to investigate a historical question or problem and communicate the results of that investigation. Through this broad preparation, history majors acquire essential knowledge and critical skills, which provide valuable assets for a wide spectrum of professions and occupations as well as the The online catalog can be accessed at: http://catalog.memphis.edu/index.php

fundamental basis for advanced study. Program objectives for a B.A. in History are: (a) a fundamental knowledge of the past, including key historical events, ideas, figures, movements, and periods; (b) an awareness of the diversity of historical experiences over time and space; (c) the ability to recognize, locate, analyze critically, and utilize primary and secondary sources; (d) the ability to recognize and evaluate differing historical interpretations and methodologies; (e) the ability to research a topic thoroughly using both primary and secondary sources, and to present a clear and well-written historical argument based on that research; (f) express a high degree of satisfaction with the quality of the education received in that program

# History, (B.A.)

The Department of History introduces students to the richness and complexity of the human experience through a curriculum that covers all major geographic areas and time periods, and emphasizes both the unity of that experience and the diversity resulting from such factors as cultural, social, and gender differences. We seek to develop not only a knowledge of the past, but also an appreciation of history as an intellectual discipline that employs a wide variety of scholarly methodologies in its effort to understand that past. Students are taught to think and work as historians: to read critically and analytically both primary and secondary sources, to appreciate the complexity of historical issues and multiplicity of history majors acquire essential knowledge and critical skills, which provide valuable assets for a wide spectrum of professions and occupations as well as the fundamental basis for advanced study. Program objectives for a B.A. in History are: (a) a fundamental knowledge of the past, including key historical events, ideas, figures, movements, and periods; (b) an awareness of the diversity of historical experiences over time and space; (c) the ability to recognize, locate, analyze critically, and utilize primary and secondary sources; (d) the ability to recognize and evaluate differing historical interpretations and methodologies; (e) the ability to research a topic thoroughly using both primary and secondary sources, and well-written historical argument based on that research; (f) express a high degree of satisfaction with the quality of the education received in that program.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (33 hours)

Majors must complete 33 semester hours in history courses. Of the 33 hours, at least 9 hours must be from HIST 1110, HIST 1120, HIST 2010, and HIST 2020; and at least 21 hours must be in upper-division courses. Of the 21 upper-division hours required, at least 6 must be taken outside of the European and United States fields and a maximum of 18 may be taken in any one field (African, Ancient, Asian, European, Latin American, Middle Eastern, United States).

# Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

For information on the honors program in History, please visit http://www.memphis.edu/history/undergraduate/honors.php.

# Typical 4-Year History Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
HIST LD (3) ***
```

Foreign Language/B.A. (3) \*\* Elective (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) HIST LD (3) \*\*\* Foreign Language/B.A. (3) \*\* Social/Behavioral Sciences (3) \*

### Semester Totals 30-31 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

HIST LD (3) \*\*\* Natural Science (4) \* Fine Arts (3) Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Elective (3) Natural Science (4) \* Social/Behavioral Sciences (3) \* UD elective (3)

#### Semester Totals 32 hrs

#### Junior Year

UD Elective (3) Elective (3) UD HIST (3) UD HIST (3) UD HIST (3) Humanities/Fine Arts (3) Elective (3) UD HIST (3) UD HIST (3) UD elective (3)

### Semester Totals 30 hrs

#### Senior Year

UD HIST (3) UD HIST (3) UD elective (3) UD elective (3) Elective (3) UD HIST (3) UD elective (3) UD elective (3) Elective (4)

#### Semester Totals 28 hrs

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* This plan assumes you are starting your language courses at the intermediate (2010/2020) level required for the degree. If you need to start your language sequence at an earlier level, please account for that and plug those courses into the plan. This will require that you remove one to two "elective" slots and replace them with the necessary language courses.

\*\*\*HIST LD - choose 3 from HIST 1110, HIST 1120, HIST 2010, or HIST 2020

# **History Minor**

# Requirements

Minors must complete 21 semester hours in history courses. Of the 21 hours, at least 9 hours must be from HIST 1110, 1120, 2010, and 2020; and at least 9 hours must be in upper- division courses.

HIST 1110 - World History to 1500\*\* Credit Hours: (3) HIST 1120 - World History since 1500\*\* Credit Hours: (3) HIST 2010 - U S to 1877 Credit Hours: (3) HIST 2020 - The U S Since 1877\*\* Credit Hours: (3) at least 9 hours must be in upper- division courses.

# **Interdisciplinary Programs**

Employers consistently indicate that they are seeking students who have, "the capacity to think critically, communicate clearly, solve complex problems, can demonstrate practical skills that span all areas of study." In answer to this challenge, The College of Arts and Sciences, through its Interdisciplinary Programs, offers opportunities to study and gain experience in some of today's most challenging and exciting fields; international and global studies, environmental studies, differing cultures, religious beliefs, emergency and disaster management, and gender and race. These areas of study are intentionally designed to explore new ways of looking at the problems and issues through coursework that crosses academic departments and traditional academic majors. These programs also place an emphasis on hands-on opportunities for research, field experience, and internships. Interdisciplinary programs can be chosen as majors or added as specialized minors to compliment another other majors.

# African and African American Studies, (B.A.)

Program objectives for a B.A. in African and African American Studies are to: (a). define the term "diaspora" and describe the history, scope and impact of the post-Renaissance diaspora of African peoples; (b) critique the experiences of African and African American women within the context of the collective experiences of Africans and African Americans and the world as a whole; (c) apply methodological approaches and analytical skills used in the humanities, the social and behavioral sciences, or the arts to the study of the experiences of Africans and people of African descent in the Diaspora; (d) demonstrate an understanding of the links between African cultural institutions and those of people of African descent in the Diaspora; (e) compare and contrast the history and cultures of peoples of Africa to the history and cultures of peoples of African descent in the Diaspora.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (30 hours)

# Major Core (18 hours):

### Completion of

AAAS 2100 - Intro Afr/Afr American Study \*\* Credit Hours: (3) AAAS 3100 - Research Method/Afr American \*\* Credit Hours: (3)

### Or One of the Following:

ANTH 4010 - Ethnographic Methods Credit Hours: (3) CJUS 3130 - Research Methods CJUS \*\* Credit Hours: (3) COMM 3330 - Communication Research Methods \*\* Credit Hours: (4) SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3)

### Completion of

AAAS 4100 - Seminar Afr/Afr Amer Studies \*\* Credit Hours: (3) and one course selected from each concentration (9 hours).

### Concentration (12 hours):

#### Humanities:

AAAS 4351 - Ghanaian Hist/Culture Credit Hours: (3) ENGL 3325 - Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3) ENGL 3326 - Af/Am Lit since Harlem Ren \*\* Credit Hours: (3) ENGL 4372 - Af/Am Author/Harlem Ren \*\* Credit Hours: (3) ENGL 4373 - Af/Am Author since Harlem Ren \*\* Credit Hours: (3) ENGL 4374 - Af/Am Lit Movements \*\* Credit Hours: (3) ENGL 4521 - Language and Society \*\* Credit Hours: (3) HIST 3273 - Islamic History to 1405 Credit Hours: (3) HIST 3281 - History/Africa to 1500 Credit Hours: (3) HIST 3282 - History of Africa since 1500 Credit Hours: (3) HIST 3670 - Civil War/Reconstruction\*\* Credit Hours: (3) HIST 3840 - U S Constitutional History Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) HIST 4022 - Oral History Credit Hours: (3) HIST 4050-4069 - Special Topics in History Credit Hours: (1-3) HIST 4222 - Race/Class in Latin America Credit Hours: (3) HIST 4283 - History/South Africa Credit Hours: (3) HIST 4288 - West Africa/Diaspora \*\* Credit Hours: (3) HIST 4289 - African Women's History Credit Hours: (3) HIST 4853 - African American Women Credit Hours: (3) HIST 4871 - U S Urban History Credit Hours: (3) HIST 4879 - Africa to the Americas Credit Hours: (3) HIST 4880 - Slavery/Freedom/Segregation Credit Hours: (3) HIST 4882 - Civil Rights Movement Credit Hours: (3) PHIL 3452 - Feminist Theory Credit Hours: (3) PHIL 3741 - African American Philosophy Credit Hours: (3)

### Social and Behavioral Sciences:

AAAS 4251 - African Religions/Diaspora Credit Hours: (3) ANTH 3242 - Peoples of Africa Credit Hours: (3) ANTH 3282 - American Communities \*\* Credit Hours: (3) ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4051 ANTH 4411 - Urban Anthropology Credit Hours: (3) ANTH 4412 - Neighborhood Development Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) ANTH 4660 - Museum Collections Credit Hours: (3) ANTH 4661 - Collections Research Credit Hours: (3) ANTH 4662 - Museum Exhibitions Credit Hours: (3) CJUS 3510 - Law and Society Credit Hours: (3) CJUS 4460 - Race, Ethnicity and Justice in America Credit Hours: (3) ESCI 4431 - Urban Geography Credit Hours: (3) ECON 4740 - Health Care Economics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3415 - Feminist Political Theory Credit Hours: (3) POLS 3420 - Race and Politics in U.S. Credit Hours: (3) POLS 4101 - Political Statistics \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4317 - Democratic Transitions Credit Hours: (3) POLS 4415 - African-Am Pol Thght to 1900 Credit Hours: (3) POLS 4416 - African-Am Pol Tht from 1900 Credit Hours: (3) POLS 4511 - International Security Credit Hours: (3) SOCI 3112 - Contemporary Social Problems \*\* Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3420 - Sociology of the South Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4460 - Black/White Women in South Credit Hours: (3) SOCI 4631 - Cities in Change Credit Hours: (3)

#### The Arts:

AAAS 4451 - Rhetoric of Hip Hop \*\* Credit Hours: (3) ARTH 4112 - Egypt Art-Old Kingdom Credit Hours: (3) ARTH 4113 - Egypt Art-New Kingdom Credit Hours: (3) ARTH 4181 - Arts Africa/Oceania/N America Credit Hours: (3) ARTH 4183 - Visual Arts of Africa Credit Hours: (3) ARTH 4185 - African American Art Credit Hours: (3) ARTH 4660 - Museum Collections Credit Hours: (3) ARTH 4662 - Museum Exhibitions Credit Hours: (3) COMM 3360 - Rhetoric of Pop Culture Credit Hours: (3) COMM 3361 - African-American Rhetoric \*\* Credit Hours: (3) COMM 4341 - Interpersonal Communication \*\* Credit Hours: (3) COMM 4364 - Gendered Public Discourse Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4804 - Blues Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3) THEA 4545 - Thea/African Diaspora Credit Hours: (3)

# Electives (40-43 hours)

Electives may be chosen to bring the total number of hours to 120.

# Typical 4-Year African and African American Studies Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
Elective (3)
Foreign Language/B.A. (3)
AAAS 2100 - Intro Afr/Afr American Study ** Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Elective (3)
Elective (3)
Foreign Language/B.A. (3)
Humanities (3) *
```

### Semester Totals 30-31 hrs

### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

```
Social/Behavioral Sci. (3) *
COMM 2381 - Oral Communication ** Credit Hours: (3)
Natural Science (4) *
Elective (3)
History (3) *
Elective (3)
Fine Arts (3) *
Natural Science (4) *
AAAS Arts Core (3)
```

### Semester Totals 32 hrs

### Junior Year

```
AAAS Humanities Core Elective (3)
Social/Behavioral Sciences (3) *
History (3) *
AAAS 3100 - Research Method/Afr American ** Credit Hours: (3)
AAAS conc. elective (3)
AAAS Soc/Behav core elective (3)
AAAS conc. elective (3)
UD elective (3)
UD elective (3)
Elective (3)
```

### Semester Totals 30 hrs

### Senior Year

UD elective (3) AAAS conc. elective (3) UD elective (3) Elective (3) Elective (3) AAAS 4100 - Seminar Afr/Afr Amer Studies \*\* Credit Hours: (3) UD elective (3) AAAS conc. elective (3) Elective (4)

Semester Totals 28 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120-121

\*Must satisfy University General Education Program Requirement

# International and Global Studies, (B.A.)

The International and Global Studies (B.A.) program provides the opportunity to bring the knowledge of several traditional disciplines to bear upon a focal point of human relationships and problems that cross national and cultural boundaries. The program objectives are designed to serve the student who seeks knowledge of the range of contemporary and possible future problems that confront international society and an understanding of alternative national and cultural perspectives on solutions to those problems. The program also serves the needs of students planning a career in the Foreign Service or related agencies of the federal government and students preparing for employment abroad in the private sector, or in international organizations, private or public. The program objectives are to: (a) learn key issues of contention related to the international system; (b) learn central economic, historical, cultural, geographical, and political concepts related to the study of the international system; (c) demonstrate competency in at least one modern foreign language; (e) be able to conduct and present scholarly research on international issues; (f) complete at least one internationally-related experiential learning activity.

The program emphasis is on the course work in history, political science, economics, anthropology, and geography, with contributions from other social science disciplines and art. Within the program, the student is required to concentrate a part of the work in the field of American foreign policy or in one of five areas of the world. Students are encouraged to pursue the study of a foreign language and to seek opportunities for travel and study abroad. The student's program should be planned in consultation with the Director or Associate Director of International and Global Studies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the following are required as prerequisites for upper-division courses in the International and Global Studies major: Social Science:

ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) POLS 1501 - International Relations\*\* Credit Hours: (3)

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (39 hours)

Core requirements (27 hours)

#### Lower Division Core (6 hours)

Select one (1) from the following: POLS 1501 - International Relations\*\* Credit Hours: (3)

or

INTL 1101 - Introduction to International and Global Studies Credit Hours: (3)

Select one (1) from the following (unless taken to satisfy previous requirement) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ECON 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ESCI 1301 - Survey of World Regions Credit Hours: (3) INTL 1101 HIST 1110 - World History to 1500\*\* Credit Hours: (3) HIST 1120 - World History since 1500\*\* Credit Hours: (3) POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) POLS 1501

#### Upper Division Core (21 hours)

Global Studies (Select 9 hours from the following 4 courses) ANTH 3200 - Culture and Change around the World Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) ESCI 4252 - Global Environmental Change Credit Hours: (3) HIST 4260 - World since 1945 Credit Hours: (3) POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3) POLS 4512 - Global Environmental Politics Credit Hours: (3)

International Political, Economic, and Development Processes - Select 9 hours from at least 2 disciplines ANTH 3500 - Anth of Global Health \*\* Credit Hours: (3) ANTH 4415 - Anthropology Human Rights Credit Hours: (3) ANTH 4416 - Culture/Identity/Power Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) ENGL 4442 - Studies in World Literature Credit Hours: (3) ENGL 4521 - Language and Society \*\* Credit Hours: (3) ESCI 4430 - Economic Geography Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3505 - International Organizations Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3) SOCI 2100 - Sociology of Globalization Credit Hours: (3) UNIV 3550 - Clash of Cultures Credit Hours: (3)

Note that courses taken here cannot be double-counted for concentration credit hours

#### Seminar

INTL 4601 - Seminar in International and Global Studies Credit Hours: (3)

# Concentration (9 hours)

### **Global Studies**

Global Studies students gain functional expertise in one of the following areas of emphasis: (1) Conflict, Peace, and Human Rights, (2) Global Governance & Political Economy (3) International Development & Environmental Sustainability, (4) Global Health & Ethics, or (5) Global Communication, Administration, & Management. Students choose credits in at least 2 disciplines in consultation with their advisor from the following:

644

ANTH 3200 - Culture and Change around the World Credit Hours: (3) ANTH 3500 - Anth of Global Health \*\* Credit Hours: (3) ANTH 4415 - Anthropology Human Rights Credit Hours: (3) ANTH 4416 - Culture/Identity/Power Credit Hours: (3) ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) ANTH 4551 - Culture/Sex/Childbirth Credit Hours: (3) CJUS 2110 - Comparative Justice System Credit Hours: (3) CJUS 4190 - Terrorism Soc/Legl Prsp \*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) ENGL 4442 - Studies in World Literature Credit Hours: (3) ENGL 4511 - Language and Literature \*\* Credit Hours: (3) ENGL 4521 - Language and Society \*\* Credit Hours: (3) ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3) ENGL 4532 - Skills/App/Assess ESL \*\* Credit Hours: (3) ESCI 4252 - Global Environmental Change Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) HIST 3803 - American Diplomatic History \*\* Credit Hours: (3) HIST 3811 - U S Military/Naval History\*\* Credit Hours: (3) HIST 3815 - World War II Credit Hours: (3) HPRM 4400 - International Hospitality Credit Hours: (3) JDST 4511 - Holocaust Studies Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PADM 4227 - Issues/Nonprofit Admin Credit Hours: (3) PADM 4401 - Comparative Public Adm\*\* Credit Hours: (3) PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3) PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3) POLS 3310 - Politics/Developed World Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3340 - Power/Politics/State Credit Hours: (3) POLS 3505 - International Organizations Credit Hours: (3) POLS 3506 - American Foreign Policy \*\* Credit Hours: (3) POLS 3507 - Terrorism \*\* Credit Hours: (3) POLS 4315 - Revolution/Political Violence Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3) POLS 4506 - Prob American Foreign Policy Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3) POLS 4511 - International Security Credit Hours: (3) POLS 4512 - Global Environmental Politics Credit Hours: (3) SLS 4165 - Sport/Global City Credit Hours: (3) SLS 4175 - Internationl Persp Sport Mgmt Credit Hours: (3) UNIV 4511 - Holocaust Studies Credit Hours: (3)

#### Area Studies

Choose 3 courses in at least 2 disciplines in consultation with academic advisor. (9 credits)

ANTH 3200 - Culture and Change around the World Credit Hours: (3) ANTH 3242 - Peoples of Africa Credit Hours: (3) CHIN 3402 - Readings in Chinese Culture Credit Hours: (3) CHIN 4301 - Modern Chinese Fiction Credit Hours: (3) CHIN 4304 - Advanced Chinese | Credit Hours: (3) CHIN 4305 - Advanced Chinese II Credit Hours: (3) CHIN 4501 - Intro to Chinese Linguistics Credit Hours: (3) CJUS 2110 - Comparative Justice System Credit Hours: (3) CLAS 2481 - Mythology \*\* Credit Hours: (3) ENGL 3220 - British Lit since 1750 \*\* Credit Hours: (3) ENGL 4442 - Studies in World Literature Credit Hours: (3) ENGL 4511 - Language and Literature \*\* Credit Hours: (3) ENGL 4521 - Language and Society \*\* Credit Hours: (3) ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3) ENGL 4532 - Skills/App/Assess ESL \*\* Credit Hours: (3) ESCI 1401 - Intro/Cultural Geography Credit Hours: (3) ESCI 4307 - Thematic Studies/China Credit Hours: (3) FREN 3401 - French Civilization Credit Hours: (3) FREN 3791 - French for Commerce | Credit Hours: (3) FREN 3900 - French Culture and Society Credit Hours: (3-6) FREN 4415 - Francophone Literature Credit Hours: (3) FREN 4780 - Individual Study French Credit Hours: (1-3) FREN 4801 - Cont France/Francophone World Credit Hours: (3) GERM 3411 - Intro German Lit and Culture | Credit Hours: (3) GERM 3412 - Intro Germ Lit and Culture II Credit Hours: (3) GERM 3791 - Business German | Credit Hours: (3) GERM 3792 - Business German II Credit Hours: (3) GERM 4443 - German Writers 20th Century Credit Hours: (3) GERM 4451 - German Drama Credit Hours: (3) GERM 4465 - German Narrative Prose Credit Hours: (3) GERM 4466 - German Poetry Credit Hours: (3) GERM 4480 - Goethe Credit Hours: (3) GERM 4501 - Teaching German Pedagogy Credit Hours: (3) HIST 3211 - Latin American History to 1808 Credit Hours: (3) HIST 3212 - Latin American History since 1808 Credit Hours: (3) HIST 3273 - Islamic History to 1405 Credit Hours: (3) HIST 3275 - History of Jewish People Credit Hours: (3) HIST 3282 - History of Africa since 1500 Credit Hours: (3) HIST 3291 - Modern Asia Credit Hours: (3) HIST 3302 - Modern Europe 1800-Present \*\* Credit Hours: (3) HIST 3815 - World War II Credit Hours: (3) HIST 4145 - History of Modern Germany Credit Hours: (3) HIST 4162 - Russia after 1917 Credit Hours: (3) HIST 4213 - Women/Gender/Latin America Credit Hours: (3) HIST 4221 - 20th Century Latin Amer Rev Credit Hours: (3) HIST 4222 - Race/Class in Latin America Credit Hours: (3) HIST 4272 - Modern Middle East \*\* Credit Hours: (3) HIST 4283 - History/South Africa Credit Hours: (3) HIST 4288 - West Africa/Diaspora \*\* Credit Hours: (3) HIST 4292 - Modern China 1800-Present \*\* Credit Hours: (3) HIST 4294 - Modern Japan 1800-Present \*\* Credit Hours: (3) HIST 4461 - Europe in the Age of Total War, 1914-1945 Credit Hours: (3) ITAL 3311 - Adv Conversation/Composition | Credit Hours: (3) ITAL 3312 - Adv Conversation/Composition II Credit Hours: (3) ITAL 3411 - Intro to Italian Literature Credit Hours: (3) ITAL 3900 - Italian Culture and Society Credit Hours: (3-6) JAPN 3401 - Intro to Japanese Literature Credit Hours: (3) JAPN 3402 - Readings/JAPN Culture Credit Hours: (3) JAPN 3900 - Japan Culture/Society Credit Hours: (3-6) JAPN 4401 - Advanced Japanese | Credit Hours: (3)

JAPN 4402 - Advanced Japanese II Credit Hours: (3) JAPN 4701 - Japn/Professional Purpose | Credit Hours: (3) LALI 4442 - Italian Cinema Credit Hours: (3) PHIL 3721 - Chinese Philosophy Credit Hours: (3) POLS 3302 - West Europe Govt/Politics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3309 - Govt/Politics of Mid East \*\* Credit Hours: (3) POLS 3310 - Politics/Developed World Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3) PORT 4024 - Brazilian Short Story Credit Hours: (3) SPAN 3312 - Adv Conversation Credit Hours: (3) SPAN 3313 - Advanced Composition Credit Hours: (3) SPAN 3550 - Latin America Country & People\*\* Credit Hours: (3) SPAN 4306 - Applied Span Linguistics Credit Hours: (3) SPAN 4410 - Spanish Lit and Civilization Credit Hours: (3) SPAN 4431 - Contemporary Spanish Prose Credit Hours: (3) SPAN 4432 - Contemp Spanish Poetry/Drama Credit Hours: (3) SPAN 4510 - Spanish Amer Lit/Civilization Credit Hours: (3) SPAN 4561 - Pre-Contemp Span Amer Fiction Credit Hours: (3) SPAN 4562 - Contemporary Span Amer Fiction Credit Hours: (3) SPAN 4563 - Hispanic Literature Genres Credit Hours: (3) SPAN 4701 - Spanish for Commerce | Credit Hours: (3) SPAN 4702 - Spanish for Commerce II Credit Hours: (3) SPAN 4703 - Languages/Cultures/Communities Credit Hours: (3) UNIV 4511 - Holocaust Studies Credit Hours: (3)

# Foreign Language (6 hours)

In addition to the Bachelor of Arts language requirement, completion of an additional six hours in that same language at the 3000 level or higher.

### **Experiential Activity**

Students are required to complete an international or experiential learning experience. This may be fulfilled through participation in a formal education abroad program or through foreign based work, service, or internship activities. A U.S.-based experience of an international nature or prior international experience may be considered. This experience must be approved by the Director.

# Electives (21-22 hours)

Electives may be chosen to bring the total number of hours to 120.

## Typical 4-Year International and Global Studies Sequence

### **Freshman Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3)
Elective (3)
Foreign Language/B.A. (3)
MATH (3-4) \*
POLS 1501 - International Relations\*\* Credit Hours: (3)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
Lower Division Core Selection (3)
Foreign Language/B.A. (3)
Humanities/Fine Arts (3) \*
Elective (3)

#### Semester Totals 30-31 hrs

### Sophomore Year

History (3) \* Social/Behavioral Science (if needed) (3) Natural Science (4) \* UD Foreign Language (3) Fine Arts (3) \*

Elective (3) Natural Science (4) \* UD Foreign Language (3) History (3) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

### Junior Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
Upper Division Core Selection (3)
Upper Division Core Selection (3)
Inter. Processes (3)

Upper Division Core Selection (3) UD Elective (3) Inter. Processes (3) Inter. Processes (3) Elective (3)

#### Semester Totals 30 hrs

### Senior Year

INTL 4601 - Seminar in International and Global Studies Credit Hours: (3)
INTL conc. elective (3)
UD elective (3)
Elective (3)

INTL conc. elective (3) UD elective (3) Elective (4) INTL conc. elective (3)

#### Semester Totals 28 hrs

### Total Hours: 120-121

### Total Hours Required for Graduation: 120

\*\*Courses offered only online or both online and on-ground

# **African and African American Studies Minor**

Completion of 18 semester hours including AAAS 2100, AAAS 3100, and 12 hours of electives from the following groups, with at least 3 hours from each group. Students may also choose other courses not on the following list as substitutions with the approval of the African and African American Studies advisor:

### Requirements

#### Humanities:

AAAS 4351 - Ghanaian Hist/Culture Credit Hours: (3) ENGL 3325 - Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3) ENGL 3326 - Af/Am Lit since Harlem Ren \*\* Credit Hours: (3) ENGL 4372 - Af/Am Author/Harlem Ren \*\* Credit Hours: (3) ENGL 4373 - Af/Am Author since Harlem Ren \*\* Credit Hours: (3) ENGL 4374 - Af/Am Lit Movements \*\* Credit Hours: (3) ENGL 4521 - Language and Society \*\* Credit Hours: (3) HIST 3273 - Islamic History to 1405 Credit Hours: (3) HIST 3281 - History/Africa to 1500 Credit Hours: (3) HIST 3282 - History of Africa since 1500 Credit Hours: (3) HIST 3670 - Civil War/Reconstruction\*\* Credit Hours: (3) HIST 3840 - U S Constitutional History Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) HIST 4022 - Oral History Credit Hours: (3) HIST 4050-4069 - Special Topics in History Credit Hours: (1-3) HIST 4283 - History/South Africa Credit Hours: (3) HIST 4288 - West Africa/Diaspora \*\* Credit Hours: (3) HIST 4289 - African Women's History Credit Hours: (3) HIST 4853 - African American Women Credit Hours: (3) HIST 4871 - U S Urban History Credit Hours: (3) HIST 4879 - Africa to the Americas Credit Hours: (3) HIST 4880 - Slavery/Freedom/Segregation Credit Hours: (3) HIST 4882 - Civil Rights Movement Credit Hours: (3) PHIL 3452 - Feminist Theory Credit Hours: (3) PHIL 3741 - African American Philosophy Credit Hours: (3)

#### Social and Behavioral Sciences:

AAAS 4251 - African Religions/Diaspora Credit Hours: (3) ANTH 3242 - Peoples of Africa Credit Hours: (3) ANTH 3282 - American Communities \*\* Credit Hours: (3) ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4010 - Ethnographic Methods Credit Hours: (3) ANTH 4051 ANTH 4411 - Urban Anthropology Credit Hours: (3) ANTH 4412 - Neighborhood Development Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) ANTH 4660 - Museum Collections Credit Hours: (3) ANTH 4661 - Collections Research Credit Hours: (3) ANTH 4662 - Museum Exhibitions Credit Hours: (3) CJUS 3510 - Law and Society Credit Hours: (3) CJUS 4460 - Race, Ethnicity and Justice in America Credit Hours: (3) ESCI 4431 - Urban Geography Credit Hours: (3) ECON 4740 - Health Care Economics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3415 - Feminist Political Theory Credit Hours: (3) POLS 3420 - Race and Politics in U.S. Credit Hours: (3) POLS 4101 - Political Statistics \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4317 - Democratic Transitions Credit Hours: (3) POLS 4415 - African-Am Pol Thght to 1900 Credit Hours: (3) POLS 4416 - African-Am Pol Tht from 1900 Credit Hours: (3) POLS 4511 - International Security Credit Hours: (3) SOCI 3112 - Contemporary Social Problems \*\* Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3420 - Sociology of the South Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4460 - Black/White Women in South Credit Hours: (3)

#### The Arts:

ARTH 4111 - Art/Archaeology of Egypt Credit Hours: (3) ARTH 4112 - Egypt Art-Old Kingdom Credit Hours: (3) ARTH 4113 - Egypt Art-New Kingdom Credit Hours: (3) ARTH 4181 - Arts Africa/Oceania/N America Credit Hours: (3) ARTH 4183 - Visual Arts of Africa Credit Hours: (3) ARTH 4185 - African American Art Credit Hours: (3) ARTH 4660 - Museum Collections Credit Hours: (3) ARTH 4662 - Museum Exhibitions Credit Hours: (3) COMM 3360 - Rhetoric of Pop Culture Credit Hours: (3) COMM 3361 - African-American Rhetoric \*\* Credit Hours: (3) COMM 4341 - Interpersonal Communication \*\* Credit Hours: (3) COMM 4364 - Gendered Public Discourse Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4804 - Blues Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3) THEA 4545 - Thea/African Diaspora Credit Hours: (3)

## **Asian Studies Minor**

## Requirements

A minimum of 18 semester hours, including

```
CHIN 2010 - Intermediate Chinese | Credit Hours: (3) and
```

```
JAPN 2010 - Intermediate Japanese I Credit Hours: (3)
and
JAPN 2020 - Intermediate Japanese II Credit Hours: (3)
```

#### 6 Semester Hours from

or

CHIN 4301 - Modern Chinese Fiction Credit Hours: (3) HIST 3291 - Modern Asia Credit Hours: (3) HIST 4292 - Modern China 1800-Present \*\* Credit Hours: (3) HIST 4294 - Modern Japan 1800-Present \*\* Credit Hours: (3) PHIL 3721 - Chinese Philosophy Credit Hours: (3)

#### 6 Semester Hours from

ESCI 4307 - Thematic Studies/China Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3) UNIV 4506 - The Chinese Credit Hours: (3)

## **Classical Studies Minor**

Those who value education because they value the ability to think clearly and express ideas powerfully, often choose the liberal arts. The Classical Studies Minor is proposed to expose students to the very foundation of the liberal arts and "Western Tradition." A minor in Classical Studies can serve as a prestigious and powerful springboard for professional careers in areas such as law, journalism, medicine, and business. Those who are interested in the beauty and study of antiquity may also pursue careers in teaching, academics, or museum work. The Classical Studies minor is comprised of courses which span different departments and colleges.

### Requirements

A total of 18 hours as follows:

#### Core:

9 hours from the following with no more than 2 courses from any one subject area:

LATN 1010 - Elementary Latin I Credit Hours: (3) LATN 1020 - Elementary Latin II Credit Hours: (3) LATN 2010 - Intermediate Latin I Credit Hours: (3) LATN 2020 - Intermediate Latin II Credit Hours: (3) CLAS 2481 - Mythology \*\* Credit Hours: (3) POLS 1101 - Intro Ancient Political Thgt \*\* Credit Hours: (3)

#### **Elective Courses:**

9 hours from the following with no more than 2 courses from any one subject area:

ARTH 4111 - Art/Archaeology of Egypt Credit Hours: (3) ARTH 4112 - Egypt Art-Old Kingdom Credit Hours: (3) ARTH 4113 - Egypt Art-New Kingdom Credit Hours: (3) ARTH 4121 - Ancient Art Near East Credit Hours: (3) ARTH 4123 - Greek Art Credit Hours: (3) ARTH 4124 - Roman Art Credit Hours: (3) ARTH 4125 - Art/Archaeology Pompeii Credit Hours: (3) ARTH 4129 - Ancient/Medieval Architecture Credit Hours: (3) CLAS 3021 - Medical Terminology Credit Hours: (3) CLAS 3413 - Greek Lit in Translation Credit Hours: (3) CLAS 3414 - Roman Lit in Translation Credit Hours: (3) CLAS 4780 - Individual Study Classics Credit Hours: (1-3) CLAS 4791 - Studies in Classics Credit Hours: (1-3) ENGL 4461 - Bible as Literature Credit Hours: (3) HIST 3320 - Ancient World \*\* Credit Hours: (3) HIST 4320 - Ancient Near East Credit Hours: (3) HIST 4321 - Greek Experience \*\* Credit Hours: (3) HIST 4322 - The Roman World Credit Hours: (3) HIST 4323 - Egypt of the Pharaohs \*\* Credit Hours: (3) HIST 4361 - History of Byzantine Empire \*\* Credit Hours: (3) PHIL 3001 - History of Ancient Philosophy \*\* Credit Hours: (3) PHIL 4211 - Ancient Philosophy Credit Hours: (3) POLS 3401 - Legal/Pol Thght Classical Credit Hours: (3)

## **Cognitive Science Minor**

The University of Memphis is the home of many interdisciplinary research centers, including the Institute for Intelligent Systems. The IIS has several full-time faculty and faculty affiliates that participate in research focused on perception, cognition, and intelligence. They are also host to an interdisciplinary minor in Cognitive Science, available to any undergraduate not minoring in Psychology (see section on the Cognitive Science concentration under the Psychology major for student seeking training in this area).

Students majoring in Philosophy, Computer Science, Management, Economics, and many more can benefit from taking coursework in diverse areas that interrelate in their focus on human and computer thinking and intelligence.

The goals of the minor are to 1) develop computational thinking 2) develop a unique perspective and approach to problem solving and 3) gain depth and appreciation for issues that pertain to cognition and intelligence and 4) develop computer skills desirable and useful in industry, research, and teaching.

## Requirements

## Core (9 hours)

PSYC 1030 - General Psychology\*\* Credit Hours: (3) PSYC 3303 - Thinking/Cognitive Processes \*\* Credit Hours: (3) PSYC 3530 - Psychology of Language Credit Hours: (3)

### Computer Science Requirement (3-4 hours)

Take one of the following courses:

IIS 1010 - Intro to Intelligent Systems Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

## Electives (6-7 hours)

Select two courses from the following (cannot be from the Major):

PHIL 3460 - Nature/Mind/Knowledge Credit Hours: (3) PHIL 4421 - Philosophy of Mind Credit Hours: (3) PHIL 4661 - Philosophy of Science Credit Hours: (3) ECON 4512 - Behavioral Economics Credit Hours: (3) COMP 2700 - Discrete Structures Credit Hours: (4) COMP 4720 - Intro Artificial Intelligence Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 4083 - Dynamical Systems/Chaos Credit Hours: (3) ENGL 3511 - Intro to Linguistics \*\* Credit Hours: (3)

## **Emergency Management Minor**

The interdisciplinary Emergency Management Minor is designed for students with a diversity of backgrounds and interest in applying that background to emergency management, community resilience to disaster, environmental hazards mitigation, emergency management response, and business continuity/disaster recovery, and will address the following critical knowledge:

the physical and social dimensions of disasters through combining knowledge from various physical, social, and applied disciplines;

the intersection of public policy to disaster risk, response, and mitigation;

the intersection of the private, nonprofit, and governmental sectors and how this effects emergency preparedness, mitigation, and recovery; sustainable development, planning for and response to extreme events and change in our physical and human landscapes; and communication dynamics and persuasive communication.

## Requirements

## The Minor

18 semester hours, 9 hours from the core and 9 hours from the list of approved electives.

## Core (9 hours)

EMGT 3100 - Seminar in Emergency Management Credit Hours: (3) (ESCI 3100/PADM 3100)

#### Select One from:

ESCI 4251 - Environmental Hazards Credit Hours: (3) ESCI 3131 - Severe Weather Credit Hours: (3) CJUS 4190 - Terrorism Soc/Legl Prsp \*\* Credit Hours: (3)

#### Capstone Experience:

pre-approved internship experience related specifically to emergency management policy, procedures, planning, etc. Alternatively, the student could complete a research seminar/project on a relevant and pre-approved emergency management topic. Select one from:

EMGT 4000 - Internship Credit Hours: (3) ESCI 4621 - Investigations In GEOG Credit Hours: (1-3) CJUS 4100 - Ind Dir Studies Credit Hours: (1-6)

## Electives (9 hours)

Three courses (9 hours), none of which have been used to fulfill the core requirements, from among the following groups with no more than two courses (6 hours) from the same group:

#### **Physical Management:**

ESCI 4251 - Environmental Hazards Credit Hours: (3) ESCI 3131 - Severe Weather Credit Hours: (3) ESCI 4551 - Urban Planning Studio Credit Hours: (3) ARCH 4551 - Site and Environmental Planning CJUS 4190 - Terrorism Soc/Legl Prsp \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4221 - Issues/Urban Admin Credit Hours: (3) SOCI 3701 - Individual and Society \*\* Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) COMM 3322 - Theories of Persuasion \*\* Credit Hours: (3)

#### Note

With approval from the Emergency Management advisor, special topics courses related to emergency management topics may be substituted to fulfill requirements for the minor.

# **Environmental Studies Minor**

The Interdisciplinary Environmental Studies Minor Program (18 hours) is intended to provide all students with the opportunity to obtain a broadbased knowledge of the environmental issues facing our planet; knowledge that spans the biological-physical threats and solutions, as well as behavioral, social, economic, and design implications. The Environmental Studies Program fosters interdisciplinary study among diverse course offerings in Anthropology, Architecture, Biology, Business, Chemistry, Earth Sciences, Economics, Philosophy, Physics, and Political Science.

## Requirements

## Students Pursuing Behavioral-Humanistic-Design Emphasis

Students pursuing behavioral-humanistic-design emphasis must select two courses (6 hours) from the following offerings:

BIOL 1020 - Biology of Organisms\*\* Credit Hours: (3) and
BIOL 1021 - Biology of Organisms Lab \*\* Credit Hours: (1)
CHEM 1010 - Chemistry of Materials\*\* Credit Hours: (3) and
CHEM 1011 - Chemistry of Materials Lab \*\* Credit Hours: (1)
ESCI 1020 - Landforms \*\* Credit Hours: (4)
ESCI 1103 - The Human Planet Credit Hours: (4)
ESCI 1010 - Weather and Climate Credit Hours: (4) or

ARCH 3421 - Environmental Systems Credit Hours: (3) with ARCH 3713 - Design Studio 3

#### Students Pursuing an Environmental Science Emphasis

Students pursuing an environmental science emphasis must select two courses (6 hours) in different disciplines from the following offerings:

BIOL 3050 - Ecology Credit Hours: (4) BIOL 4055 - Ecology/Environment Iss Credit Hours: (3) CHEM 4001 - Environmental Chemistry Credit Hours: (3) ESCI 4251 - Environmental Hazards Credit Hours: (3) ESCI 4252 - Global Environmental Change Credit Hours: (3) PHYS 4222 - Environmental Physics Credit Hours: (3)

## All Environmental Studies Students

ESCI 4201 - Urbanization/Environment Credit Hours: (3) PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3) POLS 4512 - Global Environmental Politics Credit Hours: (3) ARCH 4421 - Sustainable Design Credit Hours: (3)

### Additional Requirements

In addition to these elective courses, all Environmental Studies students are required to take one core course:

ENVR 4000 - Environ Studies Directed Rsrch Credit Hours: (3)

## Healthcare and Society Minor

This minor provides students with the opportunity to develop the additional skills that professional schools in health and medical fields are seeking outside of the required science coursework. The course options are designed to enhance the student's understanding of personal wellness, social inequalities in healthcare, provider-patient dynamics and communication, biomedical ethics, and cultural influences on health behavior.

## Requirements

#### The Minor:

18 semester hours of required courses and electives:

#### Required Core Courses:

```
    PSYC 1030 - General Psychology** Credit Hours: (3) or
    SOCI 1010 - Introduction to Sociology ** Credit Hours: (3) and
    COMM 3012 - Health Communication ** Credit Hours: (3)
    PHIL 3514 - Biomedical Ethics ** Credit Hours: (3) *
```

\* Students planning to take the MCAT are encouraged to take both PSYC 1030 and SOCI 1010 but only one course will count toward the minor requirements.

#### One Course from Each of these Three Categories:

#### Health and Wellness:

EDPR 2111 - Development Across Lifespan Credit Hours: (3) HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) NUTR 2202 - Nutrition \*\* Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3)

#### Cultural Competency:

ANTH 4521 - Culture, Soc & Mental Health Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) ECON 4740 - Health Care Economics Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) PSYC 3102 - Abnormal Psychology Credit Hours: (3) PSYC 3306 - Physiological Psyc\*\* Credit Hours: (3) PSYC 3506 - Human Sexuality Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) PSYC 3512 - Health Psychology \*\* Credit Hours: (4) SOCI 4541 - Sociology of Aging Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3) SOCI 4852 - Sociology of Mental Illness Credit Hours: (3)

## **International and Global Studies Minor**

## Requirements

Completion of 18 semester hours, consisting of 6 hours from among the following courses (2 courses):

ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ESCI 1301 - Survey of World Regions Credit Hours: (3) INTL 1101 - Introduction to International and Global Studies Credit Hours: (3) UNHP 1101 - Humanities/Global Challenge Credit Hours: (3) UNHP 1102 - Social Scien/Global Challenge Credit Hours: (3) POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) POLS 1501 - International Relations\*\* Credit Hours: (3) One upper division course in modern foreign languages\*\* Credit Hours: (3) and 12 hours upper division hours (4 courses) from courses that count toward the International and Global Studies, (B.A.) major Note: A maximum of six hours from either study abroad or internship credits may be used towards fulfilling the requirements of the IS

## Legal Thought and Liberal Arts Minor

major (subject to approval by the IS director).

The minor in Legal Thought and Liberal Arts is designed to provide an interdisciplinary liberal arts program for students in any major who intend to enter the legal profession. The minor will be of particular benefit to pre-law students whose majors are more professional in nature and who are not exposed to the broader liberal arts curriculum. Students will be introduced to major intellectual traditions of the West and to ethical, social, and economic issues of significance to our time. The courses in the minor require that students read critically, think logically, and write clearly - attributes required of persons in the legal profession. Students wishing to minor in Legal Thought and Liberal Arts should contact the Pre-Professional Advisor in 107 Scates Hall.

## Requirements

#### The Minor:

18 semester hours of required courses and electives:

### Required Core Course:

```
    PHIL 1611 - Elementary Logic ** Credit Hours: (3)
    ENGL 3604 - Persuasive Writing ** Credit Hours: (3) or
    ENGL 4602 - Adv Composition ** Credit Hours: (3)
```

### **Electives:**

Select one course from four of the following five groups (each course chosen must be from a different group):

## Economic Context of the Law:

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) ECON 4210 - Public Economics Credit Hours: (3) ECON 4220 - Urban Economics Credit Hours: (3) ECON 4250 - Econ Poverty/Discrimination Credit Hours: (3)

## Historical Context of the Law:

HIST 3840 - U S Constitutional History Credit Hours: (3)

### Practical Foundations of Jurisprudence:

CJUS 3510 - Law and Society Credit Hours: (3) POLS 3219 - Judicial Process \*\* Credit Hours: (3) POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) POLS 4405 - Origin/Dev Amer Pol Thought \*\* Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3)

## Theoretical Foundations of Jurisprudence:

PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3) PHIL 3511 - Ethical Theory Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 3516 - Philosophy of Law \*\* Credit Hours: (3) PHIL 4551 - Social and Political Philosophy Credit Hours: (3) POLS 3401 - Legal/Pol Thght Classical Credit Hours: (3) POLS 3402 - Legal/Political Thght Modern Credit Hours: (3) POLS 3405 - Intro Law/Jurisprudence Credit Hours: (3) UNIV 3580 - Hebrew and Greek Legacy\*\* Credit Hours: (3)

## Critical Reading and Thinking:

Any 4000-level English literature ENGL 4230-ENGL 4461 course or ENGL 4602 - Adv Composition \*\* Credit Hours: (3) (if not taken as the core) or

Any upper-division philosophy course not listed above.

### Note

Some of these courses may have prerequisites. Students are responsible for obtaining permission from the instructor to enroll in the course if they have not fulfilled those prerequisites.

# Nonprofit Management Minor

The Division of Public and Nonprofit Administration offers an interdisciplinary minor in Nonprofit Management which includes courses that address competencies necessary for work in nonprofit organizations. The minor is open to students majoring in any department in the University or to special students who wish to enroll in order to take such a program.

Students who complete this minor and specified co-curricular activities will be eligible for certification in Nonprofit Professional (CNP) credential by the Nonprofit Leadership Alliance. The certification program is designed to build competencies in nonprofit administration through coursework, internships, volunteer opportunities, student association leadership activities and professional development workshops.

657

## Requirements

## The Minor:

18 semester hours, three hours of a required course, and 15 hours from the guided electives.

#### Required course (3 hours):

PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3)

#### Guided electives (15 hours):

Choose one from each category: (3 hours):

#### Accounting and Financial Management:

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) PADM 4227 - Issues/Nonprofit Admin Credit Hours: (3) PADM 4228 - Grant Development/Management Credit Hours: (3)

#### Organization and Administration:

PADM 3601 - Public Admin\*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)

#### Communication Skills:

COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) COMM 4380 - Communication and Conflict \*\* Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3)

Nonprofit Context:

ANTH 4412 - Neighborhood Development Credit Hours: (3) PADM 4412 - Neighborhood Dev/Social Entrep Credit Hours: (3) ART 3411 - Art for Children Credit Hours: (3) CSED 3302 PADM 3501 - Civic Engagement, Voluntarism Credit Hours: (3) PADM 4221 - Issues/Urban Admin Credit Hours: (3) POLS 3505 - International Organizations Credit Hours: (3) PSYC 3103 - Child Psychology \*\* Credit Hours: (3) SOCI 4923 SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Nonprofit Organizations:

PADM 4231 - Admin Internship Credit Hours: (3-12)

SWRK 4830 - Field Instruction Soc Work | Credit Hours: (3) and
 SWRK 4831 - Field Instruction Soc Work || Credit Hours: (4) or another approved internship course.

## **Pre-Health Professions Minor**

24 Credit minor including prerequisites for all 15 pre health profession tracks. Students should still seek advice from the Pre Health advisor for a list of specific courses needed for their chosen profession.

## Lower division courses: Choose 15 hours

BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1) BIOL 1120 - General Biology II Credit Hours: (3) BIOL 1121 - General Biol II Lab Credit Hours: (1) BIOL 1230 - Microbiology \*\* Credit Hours: (3) BIOL 1231 - Microbiology Lab \*\* Credit Hours: (1) BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology | Lab \*\* Credit Hours: (1) BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) NUTR 2202 - Nutrition \*\* Credit Hours: (3) PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab | Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1)

### Upper division courses: Choose 9 hours

ANTH 3500 - Anth of Global Health \*\* Credit Hours: (3) ANTH 4111 - Evolution and Human Health Credit Hours: (3) ANTH 4511 - Medical Anthropology Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) BIOL 3072 - Genetics Credit Hours: (3) BIOL 3073 - Genetics Laboratory Credit Hours: (1) BIOL 3130 - Cell Biology Credit Hours: (3) BIOL 3500 - Micro I/Fundmntl Aspect Credit Hours: (3) BIOL 3505 - Gen Microbiology Lab Credit Hours: (2) BIOL 3620 - Comp Anatomy of Vertebrts Credit Hours: (5) BIOL 3730 - Vertebrate Physiology Credit Hours: (4) BIOL 4511 - BIOCHEMISTRY | Credit Hours: (3) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) CHEM 3511 - Foundations/Bioorganic CHEM Credit Hours: (3) CHEM 3501 - Foundation/Bioorganic Chem Lab Credit Hours: (1) CHEM 4511 - Biochemistry | Credit Hours: (3) CLAS 3021 - Medical Terminology Credit Hours: (3) EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3)

```
PSYC 3102 - Abnormal Psychology Credit Hours: (3)
PSYC 3103 - Child Psychology ** Credit Hours: (3)
PSYC 3106 - Social Psychology ** Credit Hours: (4)
PSYC 3512 - Health Psychology ** Credit Hours: (4)
SOCI 3401 - Social Inequality ** Credit Hours: (3)
SOCI 3422 - Racial/Ethnc Minorities ** Credit Hours: (3)
SOCI 3432 - Sociology of Gender ** Credit Hours: (3)
SOCI 4851 - Medical Sociology Credit Hours: (3)
```

## **Public Administration Minor**

The Department of Public and Nonprofit Administration offers a minor in Public Administration with courses that address competencies necessary for work in local government and public agencies. The minor is open to students majoring in any department in the University.

## Requirements

Students must complete 18 hours in Political Science and Public Administration, including 9 hours of required core course and 9 hours from a set of guided electives.

### **Required Courses:**

```
POLS 1030 - American Government** Credit Hours: (3)
PADM 3501 - Civic Engagement, Voluntarism Credit Hours: (3)
PADM 3601 - Public Admin** Credit Hours: (3)
PADM 4221 - Issues/Urban Admin Credit Hours: (3)
```

### Guided Electives:

Choose 6 hours from among the following:

CJUS 4126 - CJUS Admin and Mgmt Credit Hours: (3) POLS 3211 - State/Local Government Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) PADM 4101 - Political Statistics Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PADM 4231 - Admin Internship Credit Hours: (3-12) PADM 4401 - Comparative Public Adm\*\* Credit Hours: (3) PADM 4412 - Neighborhood Dev/Social Entrep Credit Hours: (3) PADM 4412 - Neighborhood Development Credit Hours: (3)

# **Religious Studies Minor**

The minor in Religious Studies is designed for students with a diversity of backgrounds and interests in religion. Just as religion in interrelated with many other aspects of society and culture, the minor in Religious Studies will complement coursework and research on religion undertaken in a broad range of disciplines and major departments. The required courses, Introduction to Religion, and Perspectives on Religion, provide students with an appreciation of the variety of phenomena that has characterized the religious experiences and actions of humanity, and with knowledge of the basic approached that have been used to understand such experiences and actions. Elective courses offered in several departments permit the student to develop his or her interest further, by exploring particular religious traditions and ways of studying religion. The Senior Capstone Project integrates previous learning and can be coordinated with work done in the student's major, if desired, through arrangement of an appropriate faculty sponsor.

## Requirements

## The Minor:

18 semester hours of required courses and electives:

## Lower Division Core (3 hours)

RLGN 1100 - Introduction to Religion \*\* Credit Hours: (3)

## Upper Division Core (3 hours)

RLGN 3100 - Perspectives on Religion Credit Hours: (3)

## Senior Capstone Project (3 hours)

RLGN 4990 - Capstone Project Credit Hours: (3)

## Electives (9 hours)

All courses listed below are 3 hours unless otherwise noted. Other courses, including special topics, individual study, and directed readings courses, may be counted with prior permission of the Program Coordinator.

## Elective Course Listing:

AAAS 4251 - African Religions/Diaspora Credit Hours: (3) CLAS 2481 - Mythology \*\* Credit Hours: (3) ENGL 4461 - Bible as Literature Credit Hours: (3) HIST 3273 - Islamic History to 1405 Credit Hours: (3) HIST 3275 - History of Jewish People Credit Hours: (3) JDST 2850 - Religions of Abraham Credit Hours: (3) JDST 3601 - Judaism Credit Hours: (3) JDST 3661 - Perspectives on the Old Testament Credit Hours: (3) JDST 3801 - Ancient & Medieval Jewish Thought Credit Hours: (3) JDST 3802 - Modern Jewish Thought Credit Hours: (3) JDST 4511 - Holocaust Studies Credit Hours: (3) JDST 4801 - Jewish Mysticism Credit Hours: (3) PHIL 3701 - Human and the Divine Credit Hours: (3) PHIL 3702 - Philosophy of Religion Credit Hours: (3) PHIL 3721 - Chinese Philosophy Credit Hours: (3) POLS 3102 - Religion and Politics Credit Hours: (3) RLGN 4010 - Directed Readings Credit Hours: (3) RLGN 4050-4075-RLGN 4075 [Inactive] SOCI 3860 - Sociology of Religion\*\* Credit Hours: (3) UNIV 3581 - Faith/Reason/Imagination\*\* Credit Hours: (3) UNIV 3590 - New Testament Credit Hours: (3) UNIV 3565 - Comparative Christianity\*\* Credit Hours: (3)

## Women's and Gender Studies Minor

This minor exposes students to multidisciplinary approaches to the study of the lives of women, with a special focus upon their racial diversity. Students therefore take courses from both the humanities and social sciences, and study issues of racial diversity as well as gender.

## Requirements

## The Minor

18 semester hours, 9 hours from the core and 9 hours from the list of approved electives.

## Core (9 hours)

HIST 4853 - African American Women Credit Hours: (3) or SOCI 4460 - Black/White Women in South Credit Hours: (3) or PSYC 3236 - Psychology of Gender Credit Hours: (3)

PHIL 3452 - Feminist Theory Credit Hours: (3) WMST 2100 - Intr/Women/Gender Study \*\* Credit Hours: (3)

## Electives (9 hours)

Select one course from each of the following groups:

#### Women's Issues Across Time and Place:

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4551 - Culture/Sex/Childbirth Credit Hours: (3) CJUS 4460 - Race, Ethnicity and Justice in America Credit Hours: (3) HIST 4213 - Women/Gender/Latin America Credit Hours: (3) HIST 4289 - African Women's History Credit Hours: (3) HIST 4831 - History American Family \*\* Credit Hours: (3) HIST 4851 - History of Women in America \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3)

**Cultural Studies:** 

COMM 4364 - Gendered Public Discourse Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4856 - Gender and Film Credit Hours: (3) ENGL 3325 - Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3) ENGL 3326 - Af/Am Lit since Harlem Ren \*\* Credit Hours: (3) ENGL 4372 - Af/Am Author/Harlem Ren \*\* Credit Hours: (3) ENGL 4373 - Af/Am Author since Harlem Ren \*\* Credit Hours: (3) ENGL 4451 - Studies/Women and Literature \*\* Credit Hours: (3) SLS 4125 - Gender/Race/Class Urb Sp/Lei \*\* Credit Hours: (3)

#### **Diversity Among Women:**

HIST 3881 - African American History **\*\*** Credit Hours: (3) HIST 4289 - African Women's History Credit Hours: (3) HIST 4853 - African American Women Credit Hours: (3) (if not used to fulfill Core Requirement) HIST 4882 - Civil Rights Movement Credit Hours: (3) PHIL 3741 - African American Philosophy Credit Hours: (3) POLS 3320 - Human Rights/World Politics **\*\*** Credit Hours: (3) POLS 3415 - Feminist Political Theory Credit Hours: (3) POLS 4415 - African-Am Pol Thght to 1900 Credit Hours: (3) POLS 4416 - African-Am Pol Tht from 1900 Credit Hours: (3) SOCI 3401 - Social Inequality **\*\*** Credit Hours: (3) SOCI 3420 - Sociology of the South Credit Hours: (3)

#### Note

With approval from the Director of Women's and Gender Studies, a special topics course may be substituted for an elective in each group.

# **Institute for Intelligent Systems**

# **Department of Mathematical Sciences**

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics: Statistics, Mathematics, or Teaching Mathematics.

## Mathematical Sciences - (B.S.)

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

The Major (53-54 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) **Natural Science:** CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) OR PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) Completion of: MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) and either COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 4001 - Intro to Python Programming Credit Hours: (3)

## Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4082, and MATH 4611

Alternatively, students may choose from the following concentrations.

Mathematical Sciences - Statistics Concentration, (B.S.) (21 hours) Mathematical Sciences - Data Science Concentration, (B.S.) (22 hours) Electives must be chosen to bring the total number of hours to 120.

## Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student **may not** enroll in MATH 3402 without having previously completed MATH 2422.

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411. 664 Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, and MATH 2120 for prerequisite and graduation purposes.

The Honors student must take MATH 4402 - Honors Thesis Seminar.

Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

A GPA of 3.50 in all MATH courses must be maintained.

Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

## Typical 4-Year Mathematics Major Sequence

## Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) Social/Behavioral Sciences\* (3) Elective (3) Elective (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4) Natural Science<sup>+</sup> (4) Elective (3)

#### Semester Totals 30 hrs

### Sophomore Year

#### First Semester

History\* (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) MATH 2110 - Calculus III\*\* Credit Hours: (4) Natural Science<sup>+</sup> (4) Social/Behavioral Sciences\* (3)

#### Second Semester

History\* (3) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Humanities/Fine Arts\* (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

First Semester MATH 3242 - Intro Linear Algebra Credit Hours: (3) UD MATH (3) UD Elective (3) UD elective (3) COMP 4001 - Intro to Python Programming Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Second Semester

Humanities/Fine Arts\* (3) UD elective (3) Elective (3) UD MATH (3) UD MATH (3)

#### Semester Totals 30 hrs

#### Senior Year

#### **First Semester**

UD MATH (3) UD MATH (3) UD MATH (3) UD MATH (3) Elective (3)

#### Second Semester

Elective (3) Elective (3) UD elective (3) UD elective (3) Elective (1)

#### Semester Totals 28 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

## Mathematical Sciences - Data Science Concentration, (B.S.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major.:

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry || Credit Hours: (3) CHEM 1121 - General Chemistry || Lab Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers || Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab || Credit Hours: (1)

## The Major with Data Science Concentration (55 hrs)

## Major Core (33 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4)

```
Natural Science:
```

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1120 - General Chemistry || Credit Hours: (3) CHEM 1111 - General Chemistry || Lab Credit Hours: (1) CHEM 1121 - General Chemistry || Lab Credit Hours: (1) OR PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers || Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab || Credit Hours: (1)

Completion of:

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4)

## Data Science Concentration (22 hours)

COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4)

18 semester hours of upper division courses as follows: MATH 4635 - Intro Probability Theory **Credit Hours:** (3) MATH 4636 - Intro Statistical Theory **Credit Hours:** (3) COMP 4151 - Intro to Data Science **Credit Hours:** (3) COMP 4745 - Intro to Machine Learning **Credit Hours:** (3) MATH 4685 - Statistical Learning I **Credit Hours:** (3) MATH 4686 - Statistical Learning II **Credit Hours:** (3)

Electives must be chosen to bring the total to 120 hours.

## Typical 4-Year Data Science Concentration Sequence

Freshman Year ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) Social/Behavioral Sciences\* COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) Elective ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4) Natural Science+ (4) Elective

#### Year Total: 31 hours

#### Sophomore Year

History\* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

MATH 2110 - Calculus III\*\* Credit Hours: (4)

Natural Science<sup>+</sup> (4) Social/Behavioral Sciences<sup>\*</sup> COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Humanities/Fine Arts<sup>\*</sup> MATH 2120 - Differential Equations<sup>\*\*</sup> Credit Hours: (3) *Year Total: 33 hours* 

#### Junior Year

MATH 3242 - Intro Linear Algebra Credit Hours: (3) COMP 4151 - Intro to Data Science Credit Hours: (3) History\* MATH 4635 - Intro Probability Theory Credit Hours: (3) MATH 4636 - Intro Statistical Theory Credit Hours: (3) Humanities/Fine Arts\* UD elective UD elective UD elective UD elective Year Total: 30 hours

Senior Year

MATH 4685 - Statistical Learning I Credit Hours: (3) MATH 4686 - Statistical Learning II Credit Hours: (3) COMP 4745 - Intro to Machine Learning Credit Hours: (3) UD elective UD elective UD elective Elective Elective Elective (2) Year Total: 26 hours

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

668

# Mathematical Sciences - Second Major (B.S.)

The Second Major in Mathematics is designed primarily for students whose first major is Chemistry, Computer Science, Physics, or in the Engineering College. However, students with other mathematically intensive majors may be permitted to complete a second major, provided that suitable courses for Section D can be identified.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

## Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## Second Major in Mathematical Sciences (30 hours):

The requirements in Section A through Section D must be met:

### Section A (11 hours)

MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 3242 - Intro Linear Algebra Credit Hours: (3)

#### Section B (4 hours)

One of

COMP 2700 - Discrete Structures Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4)

### Section C (9 hours)

9 additional hours from upper division MATH courses with at least one course chosen from

MATH 4083 - Dynamical Systems/Chaos Credit Hours: (3) MATH 4084 - Introduction to Graph Theory Credit Hours: (3) <sup>1</sup> The online catalog can be accessed at: http://catalog.memphis.edu/index.php MATH 4085 - Introduction to Combinatorics **Credit Hours:** (3) <sup>1</sup> MATH 4086 - Analytic Number Theory **Credit Hours:** (3) <sup>2</sup> MATH 4120 - Ordinary Differential Equations **Credit Hours:** (3) <sup>3</sup> MATH 4242 - Linear Algebra **Credit Hours:** (3) <sup>4</sup> MATH 4261 - Abstract Algebra **Credit Hours:** (3) <sup>4</sup> MATH 4350 - Intro Real Analysis I **Credit Hours:** (3) <sup>5</sup> MATH 4361 - Complex Variables **Credit Hours:** (3) <sup>6</sup> MATH 4391 - Partial Differential Eqns I **Credit Hours:** (3) <sup>3</sup> MATH 4411 - Topology **Credit Hours:** (3) <sup>4</sup> MATH 4635 - Intro Probability Theory **Credit Hours:** (3) MATH 4721 - Numerical Analysis **Credit Hours:** (3) <sup>3</sup>

#### NOTE:

MATH 2120 may substitute for 3 of these hours, however, in this case, at least one course must still come from the above list.

The following courses may not be applied toward the Second Major: MATH 3581, 4050, 4051, 4080, 4081, 4082, 4151, or 4611.

<sup>1</sup> Additional prerequisite: Either MATH 2702 or COMP 2700.

- <sup>2</sup> Additional prerequisite: MATH 3221
- <sup>3</sup> Additional prerequisite: MATH 2120.
- <sup>4</sup> Additional prerequisite: MATH 2702.
- <sup>5</sup> Additional prerequisite: both MATH 2110 and MATH 2702
- <sup>6</sup> Additional prerequisite: MATH 2110

## Section D (6 hours)

6 additional upper division hours from courses which may be chosen from either MATH and/or the student's major and must be approved by the Chair or Chair's designee of the Department of Mathematical Sciences. A list of pre-approved courses can be found here.

Electives must be chosen to bring the total number of hours to 120.

Total Hours: 120

## Mathematical Sciences - Statistics Concentration, (B.S.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

#### Natural Science:

CHEM 1110 - General Chemistry | Credit Hours: (3)

CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

The Major with Statistics Concentration (56 hours)

#### Major Core (32 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) Natural Science: CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) OR PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) Completion of:

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) COMP 4001 - Intro to Python Programming Credit Hours: (3)

## Statistics Concentration (21 hours):

21 hours of upper division Math, as follows: MATH 4635 - Intro Probability Theory Credit Hours: (3) MATH 4636 - Intro Statistical Theory Credit Hours: (3) MATH 4637 - Stat Analysis/App Big Data Credit Hours: (3)

#### And either

MATH 4607 - Intro SAS Programming Credit Hours: (3) or MATH 4608 - R for Data Proc and Visual Credit Hours: (3)

### 9 Additional upper division hours chosen from Math:

MATH 4020 - Actuarial Mathematics Credit Hours: (3) MATH 4242 - Linear Algebra Credit Hours: (3) MATH 4261 - Abstract Algebra Credit Hours: (3) MATH 4350 - Intro Real Analysis I Credit Hours: (3) MATH 4351 - Intro Real Analysis II Credit Hours: (3) MATH 4361 - Complex Variables Credit Hours: (3) MATH 4391 - Partial Differential Eqns I Credit Hours: (3) MATH 4607 - Intro SAS Programming Credit Hours: (3) MATH 4608 - R for Data Proc and Visual Credit Hours: (3) MATH 4640 - Intro Probability Models Credit Hours: (3) MATH 4643 - Intro Regression/Time Ser Anyl Credit Hours: (3) MATH 4685 - Statistical Learning I Credit Hours: (3) MATH 4686 - Statistical Learning II Credit Hours: (3) MATH 4721 - Numerical Analysis Credit Hours: (3)

Electives must be chosen to bring the total to 120 hrs.

Typical 4-Year Statistics Concentration Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH 1910 - Calculus I ** Credit Hours: (4)
Social/Behavioral Sciences* (3)
Elective (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
MATH 1920 - Calculus II** Credit Hours: (4)
Natural Science** (4)
Elective (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

History\* (3)

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

```
MATH 2110 - Calculus III** Credit Hours: (4)
Natural Science** (4)
Social/Behavioral Sciences* (3)
History* (3)
MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Humanities/Fine Arts* (3)
MATH 2120 - Differential Equations** Credit Hours: (3)
```

#### Semester Totals 32 hrs

#### Junior Year

MATH 3242 - Intro Linear Algebra **Credit Hours:** (3) UD MATH (3) COMP 4001 - Intro to Python Programming **Credit Hours:** (3) UD Elective (3) Elective (3) MATH 4635 - Intro Probability Theory **Credit Hours:** (3) MATH 4636 - Intro Statistical Theory **Credit Hours:** (3) Humanities/Fine Arts\* (3) UD elective (3) UD elective (3)

#### Semester Totals 30 hrs

## Senior Year

```
MATH 4637 - Stat Analysis/App Big Data Credit Hours: (3)
UD MATH*** (3)
Elective (3)
UD elective (3)
Elective (3)
MATH 4607 - Intro SAS Programming Credit Hours: (3)
or
MATH 4608 - R for Data Proc and Visual Credit Hours: (3)
UD Math** (3)
Elective (3)
UD Elective (3)
Elective (1)
```

#### Semester Totals 28 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

\*\*\*Choose from MATH 4242, MATH 4261, MATH 4350, MATH 4351, MATH 4361, MATH 4391, MATH 4607, MATH 4637, MATH 4643, MATH 4721

## **Mathematical Sciences Minor**

## Requirements

A minimum of 20 semester hours, including

```
MATH 1910 - Calculus I ** Credit Hours: (4)
MATH 1920 - Calculus II** Credit Hours: (4)
```

## 9 Additional Upper Division Semester Hours

9 additional upper division semester hours in MATH courses approved by the Chair or Chair's designee of the Department of Mathematical Sciences

### Plus One of

COMP 2700 - Discrete Structures Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2110 - Calculus III\*\* Credit Hours: (4) or an additional upper division MATH course approved by the Chair or Chair's designee of the Department of Mathematics.

# Mathematical Sciences - Mathematics Concentration, (Accelerated B.S./M.S.)

## Mathematical Sciences Major (B.S.)

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

## Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

## Natural Science:

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## The Major (41-42 hours in addition to University General Education Program)

## Major Core (17 hours):

Completion of

MATH 1910 - Calculus I \*\* Credit Hours: (4) (this course is included in the University General Education Program requirements) MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3)

## Plus the Following Courses:

(Your choice will satisfy the University General Education Program requirements for science).

CHEM 1110 - General Chemistry | Credit Hours: (3)

CHEM 1111 - General Chemistry | Lab Credit Hours: (1)

CHEM 1120 - General Chemistry II Credit Hours: (3)

CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

or PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## Note:

All approved programs will include no more than 9 semester hours chosen from MATH 4607, MATH 4635, MATH 4636, MATH 4637, MATH 4640.

## Additional Course (3 hours):

Each major must take one additional upper division MATH course.

# Accelerated BS/MS Degree Program, with concentrations in Applied Mathematics, Mathematics, and Statistics

This program allows outstanding undergraduates to complete both a Bachelor of Science degree in Mathematical Sciences and a Master of Science degree in Mathematical Sciences with concentration in Applied Mathematics, Mathematics or Statistics. Students admitted into the program will follow a carefully designed program of study which allows them to begin course work for the Master of Science program during their senior year. Interested students are encouraged to consult with their undergraduate advisor in the Department of Mathematical Sciences and to begin planning to enter the accelerated BS/MS degree program early in their undergraduate career. Through careful coordination with their undergraduate and graduate advisors students will be able to graduate with both a bachelor's and master's degree within a five year period.

To apply, students must have finished 18 credit hours of course work in mathematics by the end of the semester of their application. Applicants must have a cumulative GPA of 3.00 (on a 4.0 scale) as well as a GPA of 3.30 (on a 4.0 scale) in their mathematics courses. The initial application for the accelerated BS/MS degree program consists of the following two parts:

- A letter of intent including two letters of reference and a copy of the applicant's transcript to be submitted to the Department of Mathematical Sciences
- Application with the Graduate School for "combination senior" status

To continue in the program beyond the bachelor's degree, students must also apply for full admission into the Graduate School and be accepted into the master's program by the Department of Mathematical Sciences.

Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Details on courses that can be applied will be available in the Department of Mathematical Sciences. However, any graduate course work will not be used to calculate the undergraduate GPA.

## Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4082, and MATH 4611

Alternatively, students may choose from the following concentrations.

Mathematical Sciences - Statistics Concentration, (B.S.) (21 hours) Mathematical Sciences - Data Science Concentration, (B.S.) (22 hours) Electives must be chosen to bring the total number of hours to 120.

## Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student **may not** enroll in MATH 3402 without having previously completed MATH 2422.

675

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

- In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411.
- Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, **and** MATH 2120 for prerequisite and graduation purposes.

The Honors student must take MATH 4402 - Honors Thesis Seminar.

Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

A GPA of 3.50 in all MATH courses must be maintained.

Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

## Typical 4-Year Mathematics Major Sequence

#### Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) Social/Behavioral Sciences\* (3) Elective (3) Elective (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4) Natural Science<sup>+</sup> (4) Elective (3)

#### Semester Totals 30 hrs

#### Sophomore Year

#### **First Semester**

History\* (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) MATH 2110 - Calculus III\*\* Credit Hours: (4) Natural Science<sup>+</sup> (4) Social/Behavioral Sciences\* (3)

#### Second Semester

History\* (3) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Humanities/Fine Arts\* (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

#### **First Semester**

MATH 3242 - Intro Linear Algebra **Credit Hours: (3)** UD MATH (3) UD Elective (3) UD elective (3) COMP 4001 - Intro to Python Programming **Credit Hours: (3)** 

#### Second Semester

Humanities/Fine Arts\* (3) UD elective (3) Elective (3) UD MATH (3) UD MATH (3)

#### Semester Totals 30 hrs

## Senior Year

#### **First Semester**

UD MATH (3) UD MATH (3) UD MATH (3) UD MATH (3) Elective (3)

#### Second Semester

Elective (3) Elective (3) UD elective (3) UD elective (3) Elective (1)

### Semester Totals 28 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

# Mathematical Sciences - Statistics Concentration, (Accelerated B.S./M.S.)

Mathematical Sciences Major (B.S.)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Program objectives for a B.S. in Mathematical Sciences are to: (a) understand the notion of a real valued function; (b) understand the concept of differentiation and be able to apply the rules of differentiation to functions of one real variable. Be able to use these techniques to solve problems in optimization; (c) understand the use of vector analysis to describe the geometry of higher dimensional spaces; (d) understand how to extend the concepts of the calculus of functions of one variable to higher dimensions; (e) use matrices to solve systems of linear equations and to describe linear transformations; (f) understand abstract structures in mathematics; (g) be able to read and present mathematical proofs including an understanding of the basic types of proofs; (h) be able to formulate their own proofs of simple mathematical statements; (i) be able to use a computer to assist with the solution of mathematical problems; (j) Have advanced knowledge of at least one specialist area of mathematics.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Note: The following requirements are general education courses that are required for the Mathematical Science Major .:

## Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

### Natural Science:

```
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
CHEM 1120 - General Chemistry || Credit Hours: (3)
CHEM 1121 - General Chemistry || Lab Credit Hours: (1)
or
PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers || Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab || Credit Hours: (1)
```

The Major (41-42 hours in addition to University General Education Program)

## Major Core (17 hours):

Completion of

MATH 1910 - Calculus I \*\* Credit Hours: (4) (this course is included in the University General Education Program requirements) MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3)

## Plus the Following Courses:

(Your choice will satisfy the University General Education Program requirements for science).
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

or

PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## Statistics Concentration (21 hours):

21 hours of upper division Math, as follows:
MATH 4635 - Intro Probability Theory Credit Hours: (3)
MATH 4636 - Intro Statistical Theory Credit Hours: (3)
MATH 4637 - Stat Analysis/App Big Data Credit Hours: (3)
And either

MATH 4607 - Intro SAS Programming Credit Hours: (3) or MATH 4608 - R for Data Proc and Visual Credit Hours: (3)

### 9 Additional upper division hours chosen from Math:

MATH 4020 - Actuarial Mathematics **Credit Hours:** (3) MATH 4242 - Linear Algebra **Credit Hours:** (3) MATH 4261 - Abstract Algebra **Credit Hours:** (3) MATH 4350 - Intro Real Analysis I **Credit Hours:** (3) MATH 4351 - Intro Real Analysis II **Credit Hours:** (3) MATH 4361 - Complex Variables **Credit Hours:** (3) MATH 4391 - Partial Differential Eqns I **Credit Hours:** (3) MATH 4607 - Intro SAS Programming **Credit Hours:** (3) MATH 4608 - R for Data Proc and Visual **Credit Hours:** (3) MATH 4640 - Intro Probability Models **Credit Hours:** (3) MATH 4643 - Intro Regression/Time Ser Anyl **Credit Hours:** (3) MATH 4685 - Statistical Learning I **Credit Hours:** (3) MATH 4686 - Statistical Learning II **Credit Hours:** (3)

Electives must be chosen to bring the total to 120 hrs.

## Note:

All approved programs will include no more than 9 semester hours chosen from MATH 4607, MATH 4635, MATH 4636, MATH 4637, MATH 4640.

## Additional Course (3 hours):

Each major must take one additional upper division MATH course.

# Accelerated BS/MS Degree Program, with concentrations in Applied Mathematics, Mathematics, and Statistics

This program allows outstanding undergraduates to complete both a Bachelor of Science degree in Mathematical Sciences and a Master of Science degree in Mathematical Sciences with concentration in Applied Mathematics, Mathematics or Statistics. Students admitted into the program will follow a carefully designed program of study which allows them to begin course work for the Master of Science program during their senior year. Interested students are encouraged to consult with their undergraduate advisor in the Department of Mathematical Sciences and to begin planning to enter the accelerated BS/MS degree program early in their undergraduate career. Through careful coordination with their undergraduate and graduate advisors students will be able to graduate with both a bachelor's and master's degree within a five year period.

To apply, students must have finished 18 credit hours of course work in mathematics by the end of the semester of their application. Applicants must have a cumulative GPA of 3.00 (on a 4.0 scale) as well as a GPA of 3.30 (on a 4.0 scale) in their mathematics courses. The initial application for the accelerated BS/MS degree program consists of the following two parts:

A letter of intent including two letters of reference and a copy of the applicant's transcript to be submitted to the Department of Mathematical Sciences

Application with the Graduate School for "combination senior" status

To continue in the program beyond the bachelor's degree, students must also apply for full admission into the Graduate School and be accepted into the master's program by the Department of Mathematical Sciences.

Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. Details on courses that can be applied will be available in the Department of Mathematical Sciences. However, any graduate course work will not be used to calculate the undergraduate GPA.

## Mathematical Sciences Electives (21-22 hours)

21 hours of upper division MATH courses except as noted below. A list of suggested programs can be found here.

NOTE: The following courses do not count towards the Mathematical Sciences major: MATH 4050, MATH 4051, MATH 4080, MATH 4081, MATH 4082, and MATH 4611

Alternatively, students may choose from the following concentrations.

Mathematical Sciences - Statistics Concentration, (B.S.) (21 hours) Mathematical Sciences - Data Science Concentration, (B.S.) (22 hours) Electives must be chosen to bring the total number of hours to 120.

## Honors Program

The Department of Mathematical Sciences offers an honors program in Mathematics and Statistics for the talented student. To be admitted into the program, an entering freshman must score at least 29 on the Math ACT, and have a high-school GPA of 3.50, although exceptions may be made by the freshman's advisor, based upon an interview at the time of initial registration.

Currently enrolled students may be admitted into the Honors Program upon an interview with the Departmental Honors Director. The basic requirements will be a cumulative grade point average of at least 3.5 in their MATH courses, an inclusive GPA of at least 3.25, and timely progress toward a degree. Such students may be admitted into MATH 1421, MATH 2421, or MATH 2422. Upon completion of the entry course with a grade of at least B, such students will retroactively receive credit for any previous course(s) in the Honors Sequence. A student may not enroll in MATH 3402 without having previously completed MATH 2422.

The successful candidate will complete the Major Core as listed above, and complete one of the Areas of Concentration listed above, with the following exceptions and additions:

In place of MATH 1910, MATH 1920, MATH 2110 and MATH 3242, the Honors student must complete the four-course sequence of Honors Mathematics courses (MATH 1421, MATH 2421, MATH 2422 and MATH 3402), and two semesters of the Mathematics Honors Seminar, MATH 3410 and MATH 3411.

Upon successful completion of the courses listed above, the student shall be considered to have completed MATH 3242, and MATH 2120 for prerequisite and graduation purposes.

The Honors student must take MATH 4402 - Honors Thesis Seminar.

Each of MATH 1421, MATH 2421, MATH 2422, MATH 3402, MATH 3410, MATH 3411, MATH 4402 must be completed with at least a grade of B.

A GPA of 3.50 in all MATH courses must be maintained.

Upon completion of the program, the successful candidates will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Mathematical Sciences," and their diplomas and records at the University of Memphis will reflect this distinction.

## **Typical 4-Year Statistics Concentration Sequence**

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) Social/Behavioral Sciences\* (3) Elective (3) Elective (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4)

## Semester Totals 30 hrs

## Sophomore Year

History\* (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

```
MATH 2110 - Calculus III** Credit Hours: (4)
Natural Science** (4)
Social/Behavioral Sciences* (3)
History* (3)
MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Humanities/Fine Arts* (3)
MATH 2120 - Differential Equations** Credit Hours: (3)
```

## Semester Totals 32 hrs

## Junior Year

```
MATH 3242 - Intro Linear Algebra Credit Hours: (3)
UD MATH (3)
COMP 4001 - Intro to Python Programming Credit Hours: (3)
UD Elective (3)
Elective (3)
MATH 4635 - Intro Probability Theory Credit Hours: (3)
MATH 4636 - Intro Statistical Theory Credit Hours: (3)
Humanities/Fine Arts* (3)
UD elective (3)
UD elective (3)
```

## Semester Totals 30 hrs

## Senior Year

MATH 4637 - Stat Analysis/App Big Data Credit Hours: (3) UD MATH\*\*\* (3) Elective (3) UD elective (3) Elective (3) MATH 4607 - Intro SAS Programming Credit Hours: (3) or MATH 4608 - R for Data Proc and Visual Credit Hours: (3) UD Math\*\* (3) Elective (3) UD Elective (3) Elective (1)

### Semester Totals 28 hrs

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

<sup>+</sup>Choose one Natural Science sequence: CHEM 1110/CHEM 1111 and CHEM 1120/CHEM 1121, OR PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121.

\*\*\*Choose from MATH 4242, MATH 4261, MATH 4350, MATH 4351, MATH 4361, MATH 4391, MATH 4607, MATH 4637, MATH 4643, MATH 4721

# **Department of Military Science**

The Department of Military Science provides a four-year program of instruction designed to provide qualified college men and women with practical experience in the art of organizing, motivating and leading others. The program is divided into two courses each of two years duration. The first, called the Basic Course, offers instruction in leadership skills, soldiering skills, and the role and use of armed forces. The second, called the Advanced Course, builds on the Basic Course, offers practical leadership experience, and prepares the student for commissioning as an Army officer. Students may apply for the four year program, which can be completed in three years with department permission, or for the two-year program.

Department faculty and staff are active duty Army personnel detailed by Department of the Army and approved by the University president. The Army officers are appointed by the University as Professor or Assistant Professor of Military Science. Students interested in enrolling in any Military Science course should contact the Department of Military Science.

# The Basic Course

The Basic Course, two years in duration, consists of two semesters of one hour per week of classroom instruction and two semesters of two hours per week of classroom instruction. Courses are designed to be taken in the following order: ARMY 1100, ARMY 1110, ARMY 1115, ARMY 1120, ARMY 2100, ARMY 2110, ARMY 2120, ARMY 3105. All textbooks are furnished, without charge, by the department.

All offered courses count as elective credit toward the total university required hours for a degree. ARMY 2115 /ARMY 2120 meets the physical activity portion of the University General Education Program Fitness and Wellness requirement.

The Basic Course is designed for incoming freshmen. All other students are eligible to enter and may compress the Basic Course requirements into one year, with department permission. There is NO MILITARY OBLIGATION for enrolling in the Basic Course. Unless specified in the course description, students in the Basic Course are not required to wear uniforms or attend leadership laboratory.

Students who successfully complete the Basic Course may apply for entry into the Advanced Course.

# The Advanced Course

The Advanced Course prepares qualified, selected male and female students for commissioning as Army officers while they continue to pursue academic degrees. Upon graduation, students may then serve in the Regular Army, Army Reserve, or Army National Guard in a variety of career fields.

To be eligible for the Advanced Course, the student must have completed the Basic Course or equivalent, (see 2-year program), be enrolled in the university full time, have at least two years remaining at the university (undergraduate or graduate), and be a U.S. citizen. Final selection is based on demonstrated academic performance, leadership potential, a qualifying score on the Officer Selection Battery of Tests, and physical qualifications.

The Advanced Course is two years in duration. During each of four semesters, the student attends three hours per week of classroom instruction and two hours per week of leadership laboratory. It is composed of ARMY 3100, ARMY 3111, ARMY 3115, ARMY 3121, ARMY 4100, ARMY 4110, ARMY 4111, ARMY 4115 and ARMY 4121 in sequence. All students receive a monthly subsistence allowance of \$200.00, tax free, while enrolled in classes. All textbooks, uniforms, and equipment are furnished, without charge, by the department.

Students are given the opportunity to develop their leadership skills through the leadership laboratory, field training, and the Advanced Camp. The leadership laboratory is designed around a cadet structure that parallels a U.S. Army unit. Field training exercises are conducted over a weekend and are an extension of the laboratory. Students are also required to attend a six-week Advanced Camp during the summer between their two years in the Advanced Course. Advanced Camp is held at a U.S. Army post. Students are paid for the six weeks at the rate of one-half the pay of a Second Lieutenant and are furnished quarters and rations as well as transportation to and from the post.

682

All required courses count as elective credit toward the total university required hours for a degree. Completion of the Advanced Course meets the Fitness and Wellness University General Education Program requirement.

# The Senior Army Advanced Course

The Senior Army Advanced Course prepares qualified, male and female students for commissioning as Army officers while they continue to pursue academic degrees. Upon graduation, students may then serve in the Regular Army, Army Reserve, or Army National Guard in a variety of career fields. To be eligible for the Senior Army Advanced Course, the student must have completed the four year ROTC academic program, be enrolled in the university, and be a U.S. citizen. Enrollment in the Senior Army Advanced Course is on a case by case requirement. All textbooks, uniforms, and equipment are furnished, without charge, by the department or university. Students are given the opportunity to further develop their leadership skills through the leadership laboratory, and mandatory physical training. The leadership laboratory is designed around a cadet's structure and all Field Training Exercises are conducted over a weekend and are an extension of the laboratory. The Senior Army Advanced Course does not count as credit toward the total university required hours for a degree.

# The Two-Year Program

The Two-Year Program provides the opportunity to those students who did not enroll in the Four-Year Program to enroll in the Advanced Course. There are three methods for students to receive placement credit for the Basic Course and enter directly into the Advanced Course.

Students who meet qualifying criteria may receive credit for the Basic Course by attending the six-week Basic Camp at Fort Knox, Kentucky, during the summer. NO MILITARY OBLIGATION is incurred by the student by attending the Basic Camp. Students are paid for the six weeks at the rate of one-half the pay of a Second Lieutenant and are furnished quarters and rations as well as transportation to and from, or a mileage allowance for use of their own automobile. Successful completion of the Basic Camp will make the student eligible to enter the Advanced Course. Interested students should contact the Department of Military Science anytime during the academic year preceding the summer they desire to attend the camp.

Students who have completed Army Basic Combat Training and Advanced Individual Training or who have completed a minimum of three years of Army Junior ROTC in high school may be granted credit for the Basic Course by the Professor of Military Science and would then be eligible for entry into the Advanced Course, provided all other requirements are met. These students, as well as Basic Camp graduates, selected for enrollment in the Advanced Course are enrolled with the same status as cadets in the Four-Year Program.

# **Scholarship Program**

Scholarships paying tuition, maintenance fee and other fees, a book allowance, and a tax-free subsistence allowance of \$200.00 per month are available to university freshmen and sophomores who are competitive academically and who will enroll in the Army ROTC program. Applications are taken from December to February each academic year. Details concerning qualifications can be obtained from the Department of Military Science.

# **Simultaneous Membership Program**

The Simultaneous Membership Program is a voluntary program under which qualified cadets in the Advanced Course may concurrently join an Army National Guard unit. The program is designed to provide cadets with additional opportunities for leadership development and, at the same time, provide them with practical unit experience as Second Lieutenant. Cadets serve in an officer-trainee capacity and participate in regular unit drills held one weekend per month and two weeks per summer. Cadets are paid for all drills at the rate of a sergeant. This pay is in addition to the regular monthly subsistence for Army ROTC cadets. Details concerning qualifications and information on availability of allocations can be obtained from the Department of Military Science.

# **Professional Military Education**

Professional Military Education is a component of the academic preparation for students desiring to pursue a commission as an Army officer. It consists of two essential parts, a baccalaureate degree and completion of university-taught, undergraduate courses from each of five designated fields of study. The fields of study are written communications, human behavior, military history, computer literacy, and math reasoning. Military Science students enrolled in the Advanced Course are also encouraged to take management and national security studies. Students may substitute approved alternative courses for any of these requirements. This is a requirement for students enrolled in the Advanced Course or before enrollment may still meet the requirement. Related required and elective courses taken for university degree requirements may also satisfy the requirement. Some of the Professional Military Education required courses may be waived

683

# **Sponsored Activities**

The Department of Military Science sponsors the following voluntary extracurricular activities to provide students in both the Basic Course and Advanced Course with additional opportunities to develop leadership in conjunction with extending the student's knowledge of military skills:

- The Army ROTC Tiger Color Guard-Members develop skill in standard drill and military ceremonies. The team provides color guards at the University of Memphis athletic events and drills competitively against ROTC teams of other colleges and universities. The team is open to individuals enrolled in any Military Science course.
- U of M Ranger Company-Members develop skills associated with patrolling, mountaineering, survival training, and other similar activities. The Ranger Company is an adventure-type unit under the direction of Army ROTC Advanced Course cadets. Membership is open to all interested full-time students.

## **Military Science Minor**

## Requirements

A minor in Military Science can be obtained through meeting the following requirements: 18 semester hours consisting of

ARMY 3200 - Warfighting Functions/Training Credit Hours: (2) ARMY 3201 - Warfighting Functions/Training Lab Credit Hours: (1) ARMY 3205 - History of Military Tactics Credit Hours: (2) ARMY 3300 - Small Unit Leadership Credit Hours: (2) ARMY 3301 - Small Unit Leadership Lab Credit Hours: (1) ARMY 4200 - The Army Officer Credit Hours: (2) ARMY 4201 - The Army Officer Lab Credit Hours: (1) ARMY 4300 - Company Grade Leadership Credit Hours: (2) ARMY 4301 - Company Grade Leadership Lab Credit Hours: (1) Physical Training courses Credit hours: (4)

# **Department of Naval Science**

The Department of Naval Science develops future officers mentally, morally, and physically, and instills in them the highest ideals of duty, loyalty, and core values of Honor, Courage, and Commitment in order to commission college graduates as Naval officers. These students will possess a basic professional background, will be motivated toward careers in the Naval Service, and have a potential for future development in mind and character so as to assume the highest responsibilities of command, citizenship, and government.

# Requirements

The general requirements for enrollment in the NROTC are:

- Be a United States citizen or national;
- Have no moral obligations or personal convictions that will prevent bearing of arms and supporting and defending the Constitution of the United States against all enemies, foreign and domestic or to taking an oath to perform such acts;
- Be at least 17 years of age on or before 1 September of the year of enrollment and less than 27 years of age on 31 December of the year an applicant expects to graduate, complete all NROTC training requirements, and be commissioned. Those with prior or current active duty in the Armed Forces may be granted age waiver equal to the number of months served. Those granted the maximum age waiver must not have reached their 30th birthday by 31 December of the year graduation and commissioning are anticipated;

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Meet physical requirements; Possess a high school diploma or equivalent certificate; Be accepted for admission as a full-time student at the University of Memphis.

# **National Four-Year Scholarship**

Recipients of National Four-Year scholarships are selected from applicants through a national competition. Applicants apply for either Navy Option or Marine option and selectees are appointed midshipmen in either the United States Naval Reserve (USNR) or United States Marine Corps Reserve (USMCR), as appropriate. Selectees also are granted the compensation and benefits authorized by law and current policy not to exceed four years (40 months or 50 months with approved fifth year benefits). During this period, the government pays for college tuition, authorized fees, a textbook stipend, a subsistence allowance as prescribed by law and Navy policy, and provides uniforms or compensation in lieu.

# **College Program**

The College Program is an alternative route into the NROTC program, and is for individuals who were not selected for a national scholarship or who did not apply for a national scholarship. Individuals can apply for the College Program at anytime. College Program students receive no monetary benefit from being in the program, but are given all uniforms.

# **Naval Sciences Minor**

## Requirements

Completion of 18 semester hours in the following:

NAVY 1500 - Introduction to Naval Science Credit Hours: (3) NAVY 1600 - Sea Power/Maritime Affairs Credit Hours: (3) NAVY 2500 - Naval Leadership & Management Credit Hours: (3) NAVY 4600 - Naval Leadership and Ethics Credit Hours: (3) (9 hours total)

## Select Three Courses From the Following Electives:

NAVY 2600 - Naval Ship Systems I/Engr Credit Hours: (3) NAVY 3500 - Navigation Credit Hours: (3) NAVY 3520 - Evolution of Warfare Credit Hours: (3) NAVY 3600 - Naval Operations & Seamanship Credit Hours: (3) NAVY 3620 - Officer Candidate School Prep Credit Hours: (3) NAVY 4500 - Naval Ship Systems II/Weapons Credit Hours: (3) NAVY 4520 - Fundamentals of Maneuver Warfare Credit Hours: (3)

## Note

The Naval Science Minor and all Naval Science courses do not require enrollment in the Naval ROTC program and are open to all University of Memphis students.

# **Department of Philosophy**

Program objectives for a B.A. in Philosophy are to: (a) recognize patterns of valid and fallacious reasoning, and basics of logical theory; (b) read major philosophical texts analytically and be able to write out critical evaluations of philosophical arguments; (c) be familiar with major ethical theories and their practical applications; (d) possess a basic knowledge of the history of philosophy, in particular Ancient Philosophy and Modern Philosophy; (e) be able to engage critically both the primary and secondary literature on philosophical subject matter, to present one's critical assessment orally to a group, and to produce a written document reflecting one's independent research on a philosophical subject.

# Philosophy, (B.A.)

Program objectives for a B.A. in Philosophy are to: (a) recognize patterns of valid and fallacious reasoning, and basics of logical theory; (b) read a major philosophical text analytically and be able to compose critical evaluations of philosophical arguments; (c) be familiar with major ethical theories and their practical applications; (d) possess a basic knowledge of the history of philosophy, in particular of Ancient Philosophy and Modern Philosophy; (e) be able to engage critically both the primary and secondary literature on philosophical subject matter, to present one's critical assessment orally to a group, and to produce a written document reflecting one's independent research on a philosophical subject.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# The Major (30 hours)

Completion of 30 semester hours in philosophy courses including

```
PHIL 1101 - Intro to Philosophy Credit Hours: (3)
or
PHIL 1102 - Intro to Ethics ** Credit Hours: (3)
PHIL 1611 - Elementary Logic ** Credit Hours: (3)
PHIL 3001 - History of Ancient Philosophy ** Credit Hours: (3)
PHIL 3002 - History of Modern Philosophy ** Credit Hours: (3)
PHIL 3411 - Contemporary Moral Problems ** Credit Hours: (3)
or
PHIL 3511 - Ethical Theory Credit Hours: (3)
and
15 additional upper division semester hours
```

To prepare philosophy students for success in a number of fields, the department offers courses in the following sub-divisions of philosophy

Philosophy of Law/Political Philosophy

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- PHIL 3516 Philosophy of Law \*\* Credit Hours: (3)
- PHIL 3550 Issues in Political Philosophy Credit Hours: (3)
- PHIL 3751 Philosophy of Race & Racism Credit Hours: (3)
- PHIL 4551 Social and Political Philosophy Credit Hours: (3)

### Ethics/Social Philosophy

PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3)

- PHIL 3452 Feminist Theory Credit Hours: (3)
- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)

PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3)
PHIL 3515 - Environmental Ethics \*\* Credit Hours: (3)
PHIL 3550 - Issues in Political Philosophy Credit Hours: (3)
PHIL 3571 - Business Ethics and Society \*\* Credit Hours: (3)
PHIL 3741 - African American Philosophy Credit Hours: (3)
PHIL 3751 - Philosophy of Race & Racism Credit Hours: (3)
PHIL 3806 - Data Ethics Credit Hours: (3)
PHIL 4551 - Social and Political Philosophy Credit Hours: (3)

Philosophy of Religion/Religious Studies

PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3)

PHIL 3451 - Existentialism Credit Hours: (3)

PHIL 3511 - Ethical Theory Credit Hours: (3)

PHIL 3701 - Human and the Divine Credit Hours: (3)

PHIL 3702 - Philosophy of Religion Credit Hours: (3)

PHIL 3721 - Chinese Philosophy Credit Hours: (3)

### Philosophy/Contemporary Culture

- PHIL 3411 Contemporary Moral Problems \*\* Credit Hours: (3)
- PHIL 3451 Existentialism Credit Hours: (3)

PHIL 3452 - Feminist Theory Credit Hours: (3)

- PHIL 3511 Ethical Theory Credit Hours: (3)
- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3741 African American Philosophy Credit Hours: (3)

PHIL 3771 - Philosophy in Literature Credit Hours: (3)

PHIL 3781 - Philosophy and Film Credit Hours: (3)

PHIL 4441 - Recent Continental Philosophy Credit Hours: (3)

PHIL 4671 - Aesthetics Credit Hours: (3)

### Philosophy of Science/Epistemology

PHIL 3460 - Nature/Mind/Knowledge Credit Hours: (3)

- PHIL 3512 Science/Technology/Human Values Credit Hours: (3)
- PHIL 3515 Environmental Ethics \*\* Credit Hours: (3)
- PHIL 3621 Intermediate Logic Credit Hours: (3)
- PHIL 4421 Philosophy of Mind Credit Hours: (3)
- PHIL 4422 Recent Anglo American Phil Credit Hours: (3)
- PHIL 4632 Advanced Logic Credit Hours: (3)
- PHIL 4661 Philosophy of Science Credit Hours: (3)

### Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to philosophy majors with an inclusive grade point average of at least 3.0 and a grade point average of at least 3.5 in the major. The student will complete, with a minimum grade of "B", a thesis submitted for credit in PHIL 4891. The thesis topic must be approved by the thesis director before the student registers for PHIL 4891.

Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Philosophy." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Philosophy Sequence

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3) MATH* (3-4)
PHIL 1101 - Intro to Philosophy Credit Hours: (3) or
PHIL 1102 - Intro to Ethics ** Credit Hours: (3)
Foreign Language/B.A. (3)
Elective (3)
```

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Foreign Language/B.A. (3) PHIL 1611 - Elementary Logic \*\* Credit Hours: (3) Social/Behavioral Sciences (3)\* Elective (3)

### Semester Totals 30-31 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History\*/Foreign Lang (3)

Elective (3) PHIL 3001 - History of Ancient Philosophy \*\* Credit Hours: (3) Natural Science\* (4) Social/Behavioral Sciences\* (3) History\* /Foreign Lang (3) UD PHIL (3) PHIL 3002 - History of Modern Philosophy \*\* Credit Hours: (3) Natural Science\* (4)

### Semester Totals 32 hrs

### Junior Year

```
Elective (3)

COMM 2381 - Oral Communication ** Credit Hours: (3)

PHIL 3411 - Contemporary Moral Problems ** Credit Hours: (3)

or

PHIL 3511 - Ethical Theory Credit Hours: (3)

History*/Elective (3)

UD PHIL (3)

Fine Arts (3)*

History*/Elective (3)

UD PHIL (3)

UD Elective (3)

UD PHIL (3)
```

### Semester Totals 30 hrs

## Senior Year

Elective (3) UD PHIL (3) UD Elective (3) UD Elective (3) UD Elective (3) UD Elective (3) Elective (3) Elective (4)

### Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Philosophy Minor**

# Requirements

Completion of 18 semester hours in philosophy courses, including

```
PHIL 1101 - Intro to Philosophy Credit Hours: (3) or
PHIL 1102 - Intro to Ethics ** Credit Hours: (3)
PHIL 1311 - Critical Thinking ** Credit Hours: (3) or
PHIL 1611 - Elementary Logic ** Credit Hours: (3)
12 upper division semester hours
```

### Note

In consultation with the coordinator of undergraduate studies in philosophy, a student may design a minor (18 hours) that applies to the student's major area of study.

# Philosophy/Juris Doctor, (B.A./J.D.)

Program objectives for a B.A./J.D. in Philosophy are to: (a) provide training in analytic and logical thinking, (b) learn how to read difficult texts and assess arguments, (c) conduct research, develop arguments, and present them clearly in speech and writing, (d) learn logical and analytic reasoning in preparation for the LSAT, (e) explore contemporary legal, political, and moral issues that are pertinent to legal professionals.

**Note:** While the combined BA/JD program is designed to accelerate the time to graduation, enrolling in the 3+3 program at the BA level does not automatically grant admission to the JD program. All admission decisions are based upon a holistic assessment of all application materials submitted. If admitted, 3+3 students will start as first-year law students at the beginning of what would have been their senior year. These students will complete their upper-division philosophy electives by taking first-year law school courses: Legal Methods 1, Legal Methods 2, Torts 1. They will complete their upper-division electives by taking Civil Procedure 1, Civil Procedure 2, Property 1, Property 2, Contracts 1, Contracts 2, Criminal Law. Unsuccessful applicants will complete their undergraduate degree in philosophy as seniors, and may apply to law school following the usual timeline and procedures.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (30 hours)

Completion of 30 semester hours in philosophy courses including:

```
PHIL 1101 - Intro to Philosophy Credit Hours: (3)
OR
PHIL 1102 - Intro to Ethics ** Credit Hours: (3)
PHIL 1611 - Elementary Logic ** Credit Hours: (3)
PHIL 3001 - History of Ancient Philosophy ** Credit Hours: (3)
PHIL 3002 - History of Modern Philosophy ** Credit Hours: (3)
PHIL 3411 - Contemporary Moral Problems ** Credit Hours: (3)
OR
PHIL 3511 - Ethical Theory Credit Hours: (3)
And
15 additional upper division semester hours
```

## Typical 6 Year Philosophy BA/JD Sequence

### **Freshman Year**

```
First Semester

PHIL 1101 - Intro to Philosophy Credit Hours: (3)

or

PHIL 1102 - Intro to Ethics ** Credit Hours: (3)

Foreign Language/B.A. (3)

MATH* (3)

Natural Science* (4)

ENGL 1010 - English Composition** Credit Hours: (3)

Semester Totals 16 hrs.
```

#### Second Semester

PHIL 1611 - Elementary Logic \*\* Credit Hours: (3)
Foreign Language/B.A. (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Natural Science\* (4)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
Semester Totals 16 hrs.

## Sophomore Year

First Semester PHIL 3001 - History of Ancient Philosophy \*\* Credit Hours: (3) PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3) or PHIL 3516 - Philosophy of Law \*\* Credit Hours: (3) {Note: The major requires students to take 3411 or 3511} History\* (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Foreign Language / B.A. (3) Semester Totals 15 hrs

#### Second Semester

PHIL 3002 - History of Modern Philosophy \*\* Credit Hours: (3)
PHIL 3511 - Ethical Theory Credit Hours: (3)
or
PHIL 3516 (3) *{Note: The major requires students to take 3411 or 3511}*History\* (3)
Social/Behavioral Sciences (3)
Foreign Language / B.A. (3)
Semester Totals 15 hrs

## Junior Year

#### **First Semester**

Social/Behavioral Sciences (3) UD PHIL Elective (3) Elective (3) Elective (3) Elective (3) Semester Totals 15 hrs

#### Second Semester

Fine Arts B.A.\*\* (3) Elective (3) Elective (3) Elective (3) Elective (3) Semester Totals 13 hrs

## Senior Year

#### **First Semester**

UD PHIL Elective - Legal Methods 1 (3) UD PHIL Elective - Torts 1 (3) UD Elective - Civil Procedure 1 (3) UD Elective - Property 1 (3) UD Elective - Contracts 1 (3) Semester Totals 15 hrs

#### Second Semester

UD PHIL Elective - Legal Methods 2 (credited towards PHIL major (2 hour course))

UD Elective - Torts 2 (3)

UD Elective - Civil Procedure 2 (2)

UD Elective - Property 2 (3)

UD Elective - Contracts 2 (2)

UD Elective - Criminal Law (3)

Semester Totals 15 hrs

**Total Hours through Year Four: 120** 

### Year Five and Six

Fall Year FiveTypical Law school curriculumSpring Year FiveTypical Law school curriculumFall Year SixTypical Law school curriculumSpring Year SixTypical Law school curriculum

# **Department of Physics and Materials Science**

Program objectives for a B.S. in Physics are: (a) Acquire knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving sessions.

# **Physics - Astronomy Concentration (B.S.)**

The objectives of the BS in Physics program with a concentration in Astronomy are to (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develocomputational skills both in programming and data analysis, (f) be able to use specialized research equipment, (g) be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) apply knowledge to independent research projects.

The Astronomy concentration is designed for students interested in acquiring knowledge and pursue a graduate degree in the field of astronomy and astrophysics. The concentration provides rigorous theoretical and computational training covering subject topics such as stars, galaxies, exoplanets, black holes, cosmology, and astrobiology.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### **Mathematics**

MATH 1910 - Calculus I \*\* Credit Hours: (4)

```
CHEM 1110 - General Chemistry | Credit Hours: (3)
CHEM 1111 - General Chemistry | Lab Credit Hours: (1)
CHEM 1120 - General Chemistry || Credit Hours: (3)
CHEM 1121 - General Chemistry || Lab Credit Hours: (1)
```

# The Major (69 hours in addition to University General Education Program)

Major Core (47 hours)

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4)

MATH 2110 - Calculus III\*\* Credit Hours: (4)

MATH 2120 - Differential Equations\*\* Credit Hours: (3)

Natural Science:

CHEM 1110 - General Chemistry | Credit Hours: (3)

CHEM 1111 - General Chemistry I Lab Credit Hours: (1)

CHEM 1120 - General Chemistry II Credit Hours: (3)

CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

#### **Completion of:**

MATH 1920 - Calculus II\*\* Credit Hours: (4)

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)

PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)

- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)

PHYS 2130 - Intermediate Physics Credit Hours: (4)

PHYS 2990 - Research in Physics | Credit Hours: (1)

PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)

PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3)

PHYS 3060 - Advanced Physics Methodology Credit Hours: (3)

PHYS 3990 - Research in Physics II Credit Hours: (2)

### Astronomy Concentration (22 hours)

PHYS 3050 - Introductory Astronomy and Astrophysics Credit Hours: (3)

PHYS 3051 - Intermediate Astronomy Lab Credit Hours: (1)

PHYS 3052 - Life in the Universe Credit Hours: (3)

PHYS 3053 - Observational Astronomy Credit Hours: (3)

PHYS 4055 - Stellar and Galactic Astronomy Credit Hours: (3)

PHYS 4056 - Extragalactic Astronomy Credit Hours: (3)

PHYS 4300 - Advanced Topics in Astronomy Credit Hours: (3) Plus one upper division elective in Physics

## Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon The online catalog can be accessed at: http://catalog.memphis.edu/index.php

background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

693

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Physics Astronomy Concentration 4 year Plan

# Freshman Year

### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
Semester Total 15 hrs.

### Second Semester

- ENGL 1020 English Comp/Analysis\*\* Credit Hours: (3)
- MATH 1920 Calculus II\*\* Credit Hours: (4)
- PHYS 2120 Physics For Scientists and Engineers II Credit Hours: (3)
- PHYS 2121 Sci/Engr Phys Lab II Credit Hours: (1)
- CHEM 1120 General Chemistry II Credit Hours: (3)
- CHEM 1121 General Chemistry II Lab Credit Hours: (1)
  - Semester Total 15 hrs.

# Sophomore Year

### **First Semester**

```
PHYS 2130 - Intermediate Physics Credit Hours: (4)
PHYS 2990 - Research in Physics I Credit Hours: (1)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
GE Humanities (3)*
Semester Total: 14 hrs
```

### Second Semester

PHYS 3050 - Introductory Astronomy and Astrophysics Credit Hours: (3) PHYS 3051 - Intermediate Astronomy Lab Credit Hours: (1) PHYS 3990 - Research in Physics II Credit Hours: (2) GE Social/Behavioral Science (3) GE History (3) \* GE Humanities (3)\* Semester Total: 15 hrs

# Junior Year

### **First Semester**

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
PHYS 4050 - Astrophysics | Credit Hours: (3)
GE History (3) *
GE Social/Behavioral Sciences (3) *
PHYS 4230 - Electronics Credit Hours: (4)
Semester Total 16 hrs
```

### Second Semester

PHYS 4222 - Environmental Physics Credit Hours: (3) Elective (3) Elective (3) UD Elective (3) Semester Total 15 hrs.

## Senior Year

### **First Semester**

```
PHYS 4051 - Astrophysics II Credit Hours: (3)
UD Elective (3)
UD Elective (3)
Elective (3)
Elective (3)
Semester Total: 15 hrs
```

### Second Semester

PHYS 4300 - Advanced Topics in Astronomy Credit Hours: (3) UD Elective (3) UD Elective (3) UD Elective (3) Elective (3) Semester Total 15 hrs.

## Total Hours: 120

### Note:

GE = General Education Requirements

BS = Bachelor of Science college requirements

UD = Upper Division

Foreign Language Requirement - See the Undergraduate Catalog

Degree hours = 120

42 Upper Division hours required for graduation

No more than 2 hours of physical education courses may be counted toward a degree

Residence - 30 of the last 60 hours must be taken at University of Memphis; at least 60 hours must be at a four-year institution; transfer students must earn at least 6 hours of a major at UofM and at least 3 hours of a minor at UofM The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# **Physics - General Physics Concentration, (B.S.)**

The objectives of the BS in Physics program are to (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develop computational skills both in programming and data analysis, (f) be able to use specialized research equipment, (g) be able to collaborate with other students inside and outside the laboratory and during problem-solving sessions, and (h) apply knowledge to execute independent research projects.

The program is tailored to provide fundamental knowledge in physics and skills necessary for students to succeed in physics or closely-related graduate programs, professional programs, or in a wide range of careers.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### **Mathematics**

MATH 1910 - Calculus I \*\* Credit Hours: (4)

### **Natural Science**

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

## The Major (71 hours in addition to University General Education Program)

#### Major Core (47 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) **Natural Science:** CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) **Completion of:** MATH 1920 - Calculus II\*\* Credit Hours: (4) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended) PHYS 2130 - Intermediate Physics Credit Hours: (4) PHYS 2990 - Research in Physics | Credit Hours: (1) PHYS 3010 - Introduction to Modern Physics Credit Hours: (3) PHYS 3011 - Methods of Theoretical Physics- | Credit Hours: (3) PHYS 3060 - Advanced Physics Methodology Credit Hours: (3) PHYS 3990 - Research in Physics II Credit Hours: (2)

## General Physics (24 hours):

PHYS 3111 - Mechanics I Credit Hours: (3) PHYS 3211 - Electricity and Magnetism-I Credit Hours: (3) PHYS 4510 - Thermal and Statistical Physics Credit Hours: (3) PHYS 4410 - Introduction to Quantum Mechanics Credit Hours: (3) PHYS 4420 - Introduction to Computational Physics Credit Hours: (3) PHYS 4211 - Waves and Optics Credit Hours: (3) plus six (6) hours of upper division PHYS courses.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Physics Sequence General Physics Concentration

## Freshman Year

### First Semester

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
ENGL 1010 - English Composition\*\* Credit Hours: (3)
Semester Total: 15 hrs

#### Second Semester

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
Semester Total: 15 hrs

### Semester Totals 30 hrs

### Sophomore Year

PHYS 2990 - Research in Physics I Credit Hours: (1)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
MATH 2110 - Calculus III\*\* Credit Hours: (4)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Semester Total: 15 hrs

#### Second Semester

PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3)
PHYS 3060 - Advanced Physics Methodology Credit Hours: (3)
MATH 2120 - Differential Equations\*\* Credit Hours: (3)
PHYS 3990 - Research in Physics II Credit Hours: (2)
Elective (1)
Social/Behavioral Sciences (3) \*
Semester Total: 15 hrs

### Semester Totals 30 hrs

### Junior Year

First Semester

PHYS 3111 - Mechanics I Credit Hours: (3) History (3) \* UD Physics Elective (3) Humanities (3)\* Social/Behavioral Sci (3)\* Semester Total: 15 hrs

Second Semester ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) PHYS 3211 - Electricity and Magnetism-I Credit Hours: (3) History (3) \* Humanities (3) \* UD Physics Elective (3)

#### Semester Totals 30 hrs

Semester Total: 15 hrs

### Senior Year

**First Semester** 

PHYS 4410 - Introduction to Quantum Mechanics Credit Hours: (3) PHYS 4211 - Waves and Optics Credit Hours: (3) UD elective (3) UD Elective (3) *Semester Total: 15 hrs* 

#### Second Semester

PHYS 4420 - Introduction to Computational Physics Credit Hours: (3) PHYS 4510 - Thermal and Statistical Physics Credit Hours: (3) Elective (3) UD Elective (3) Elective (3) Semester Total: 15 hrs

### Semester Totals 30 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Physics - Materials Science Concentration, (B.S.)**

The objectives of the BS program in physics with a concentration in Materials Science are to: (a) acquire knowledge of core principles in physics, (b) be able to justify and explain specific approaches to solving problems, (c) develop an understanding of research methodology in physics, (d) be able to effectively communicate scientific results in both oral and written reports, (e) develop computational skills both programming and data analysis, (f) be able to use specialized research equipment, (g) be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) apply of knowledge to independent research projects.

This concentration is deigned for students interested in pursuing an advanced degree and/or a career in materials science or closely related field. The concentration provides thorough theoretical, computational and experimental training covering subject topics such as hard and soft materials, photonic materials, semiconductors, magnetic materials, and nanomaterials. The concentration provides rigorous hands-on training with advanced research-grade instruments to synthesize advanced materials and analyze their properties.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### Mathematics

MATH 1910 - Calculus I \*\* Credit Hours: (4)

### **Natural Science**

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

## The Major (71 hours in addition to University General Education Program)

#### Major Core (47 hours)

Mathematics: MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) Natural Science: CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Credit Hours: (1) Completion of:

MATH 1920 - Calculus II\*\* Credit Hours: (4) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended)
PHYS 2130 - Intermediate Physics Credit Hours: (4)
PHYS 2990 - Research in Physics I Credit Hours: (1)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3)
PHYS 3060 - Advanced Physics Methodology Credit Hours: (3)

PHYS 3990 - Research in Physics II Credit Hours: (2)

# Materials Science (24 hours):

PHYS 3111 - Mechanics | Credit Hours: (3)

PHYS 3211 - Electricity and Magnetism-I Credit Hours: (3)

PHYS 4410 - Introduction to Quantum Mechanics Credit Hours: (3)

PHYS 4610 - Solid State Physics Credit Hours: (3)

PHYS 4720 - Materials Physics Credit Hours: (3)

PHYS 4994 - Research in Materials Physics Credit Hours: (3)

PHYS 4510 - Thermal and Statistical Physics Credit Hours: (3)

### Plus One from the following:

PHYS 4020 - Soft Matter and Biological Physics Credit Hours: (3)

PHYS 4230 - Electronics Credit Hours: (4)

PHYS 4420 - Introduction to Computational Physics Credit Hours: (3)

PHYS 4620 - Device Physics and Microfabric Credit Hours: (3)

PHYS 4820 - Materials Physics Lab Credit Hours: (3)

MECH 3320 - Engineering Materials Credit Hours: (3)

CIVL 3322 - Mechanics of Materials Credit Hours: (3)

## Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Typical 4-Year Physics Sequence Materials Science Concentration

### **Freshman Year**

First Semester PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) MATH 1910 - Calculus I \*\* Credit Hours: (4) CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) ENGL 1010 - English Composition\*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
Semester Total: 15 hrs

### Semester Totals 30 hrs

### Sophomore Year

#### **First Semester**

PHYS 2990 - Research in Physics I Credit Hours: (1)
PHYS 2130 - Intermediate Physics Credit Hours: (4)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
MATH 2110 - Calculus III\*\* Credit Hours: (4)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Semester Total: 15 hrs

#### Second Semester

GE Humanities/Fine Arts (3) \*
GE Social/Behavioral Sci (3) \*
UD Elective (1)
PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3)
PHYS 3990 - Research in Physics II Credit Hours: (2)
Semester Total: 15 hrs

### Semester Totals 30 hrs

### Junior Year

```
First Semester
```

PHYS 3111 - Mechanics I Credit Hours: (3) PHYS 4720 - Materials Physics Credit Hours: (3) GE History (3) \* Elective (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Semester Total: 15 hrs

#### Second Semester

MATH 2120 - Differential Equations\*\* Credit Hours: (3) PHYS 3211 - Electricity and Magnetism-I Credit Hours: (3) PHYS 4510 - Thermal and Statistical Physics Credit Hours: (3) GE History (3) \* Elective (3) Semester Total: 15 hrs

### Semester Totals 30 hrs

## Senior Year

First Semester PHYS 4410 - Introduction to Quantum Mechanics Credit Hours: (3) PHYS 4820 - Materials Physics Lab Credit Hours: (3) GE Social/Behavioral Sciences (3) \* UD Elective (3) GE History (3) \* *Semester Total: 15 hrs* 

Second Semester PHYS 4610 - Solid State Physics Credit Hours: (3) GE Humanities/Fine Arts (3) \* UD Elective (3) UD Elective (3) UD Elective PHYS/MECH/CIVL (3) Semester Total: 15 hrs

Semester Totals 30 hrs

## Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*One of PHYS 4020, 4060, PHYS 4230, PHYS 4420, PHYS 4620, MECH 3320, CIVL 3322, MECH 3322

# **Physics - Physics for Medical Sciences Concentration, (B.S.)**

The objectives of the BS program in Physics with a concentration in Medical Sciences are: (a) to acquire knowledge of core principles in physics, (b) to be able to justify and explain specific approaches to solving problems, (c) to develop an understanding of research methodology in physics, (d) to be able to effectively communicate scientific results in both oral and written reports, (e) to develop computational skills both programming and data analysis, (f) to be able to use specialized research equipment, (g) to be able to collaborate with other students in an out of the laboratory and during problem-solving sessions, and (h) to apply knowledge to independent research projects.

This concentration is designed for students interested in pursuing graduate studies in the medical sciences and a career in the health industry. The concentration provides theoretical, computational, and experimental training covering subject topics including medical physics, biophysics, biomaterials, nuclear physics, environmental physics, and radiation physics.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### Mathematics

MATH 1910 - Calculus I \*\* Credit Hours: (4)

### **Natural Science**

CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

### The Major (70 hours in addition to University General Education Program)

#### Major Core (47 hours)

#### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) Natural Science: CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) **Completion of:** MATH 1920 - Calculus II\*\* Credit Hours: (4) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable, but not recommended) PHYS 2130 - Intermediate Physics Credit Hours: (4) PHYS 2990 - Research in Physics | Credit Hours: (1) PHYS 3010 - Introduction to Modern Physics Credit Hours: (3) PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3) PHYS 3060 - Advanced Physics Methodology Credit Hours: (3) PHYS 3990 - Research in Physics II Credit Hours: (2)

### Physics for Medical Sciences (23 hours):

- BIOL 1110 General Biology | Credit Hours: (3)
- BIOL 1111 General Biology I Lab Credit Hours: (1)
- BIOL 1120 General Biology II Credit Hours: (3)
- BIOL 1121 General Biol II Lab Credit Hours: (1)
- PHYS 4020 Soft Matter and Biological Physics Credit Hours: (3)
- PHYS 4021 Applied Radiation Physics Credit Hours: (3)
- PHYS 4040 Medical Physics Credit Hours: (3)
- PHYS 4110 Nuclear and Particle Physics Credit Hours: (3)
- PHYS 4990 Research in Physics III Credit Hours: (3)

### Electives

Electives must be chosen to bring the total number of hours to 120.

## Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

703

# Typical 4-Year Physics Sequence Physics for Medical Sciences Concentration

### Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
CHEM 1110 - General Chemistry I Credit Hours: (3)
CHEM 1111 - General Chemistry I Lab Credit Hours: (1)
Semester Total 15 hrs.

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
CHEM 1120 - General Chemistry II Credit Hours: (3)
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
Semester Total 15 hrs.

### Semester Totals 30 hrs

### Sophomore Year

#### First Semester

PHYS 2130 - Intermediate Physics Credit Hours: (4)
PHYS 2990 - Research in Physics | Credit Hours: (1)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Semester Total 15 hrs.

#### Second Semester

PHYS 3060 - Advanced Physics Methodology Credit Hours: (3)
UD Elective (3)
Elective (3)
PHYS 3990 - Research in Physics II Credit Hours: (2)
BIOL 1120 - General Biology II Credit Hours: (3)
BIOL 1121 - General Biol II Lab Credit Hours: (1)
Semester Total 15 hrs.

### Semester Totals 30 hrs

### Junior Year

#### First Semester

PHYS 4020 - Soft Matter and Biological Physics Credit Hours: (3) PHYS 4021 - Applied Radiation Physics Credit Hours: (3) GE History (3) UD Elective (3) UD Elective (3) Semester Total 15 hrs

Second Semester PHYS 4040 - Medical Physics Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
GE History (3)\*
UD Elective (3)
UD Elective (3)
Semester Total: 15 hrs

### Semester Totals 31 hrs

### Senior Year

First Semester

PHYS 4110 - Nuclear and Particle Physics Credit Hours: (3)
UD Elective (3)
UD Elective (3)
GE Humanities/Fine Arts (3)
GE Social/Behavioral Science (3)
Semester Total 15 hrs

#### Second Semester

PHYS 4990 - Research in Physics III Credit Hours: (3)
GE Humanities/Fine Arts (3)
GE Social/Behavioral Science (3)
UD Elective (3)
UD Elective (3)
Semester Total 15 hrs.

### Semester Totals 31 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

### Note:

GE = General Education Requirements

BS = Bachelor of Science college requirements

UD = Upper Division

Foreign Language Requirement - See the Undergraduate Catalog

Degree hours = 120 42 Upper Division hours required for graduation

No more than 2 hours of physical education courses may be counted toward a degree

Residence - 30 of the last 60 hours must be taken at University of Memphis; at least 60 hours must be at a four-year institution; transfer students must earn at least 6 hours of a major at UofM and at least 3 hours of a minor at UofM

# **Physics - Second Major for the Bachelor of Science Degree, (B.S.)**

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

# Second Major for the Bachelor of Science Degree

```
MATH 1910 - Calculus I ** Credit Hours: (4)
    or
MATH 1720 - Trigonometry** Credit Hours: (3)
MATH 1730 - Pre-Calculus** Credit Hours: (4)
    or
MATH 1830 - Elementary Calculus** Credit Hours: (3)
PHYS 2010 - General Physics | Credit Hours: (3)
    and
PHYS 2011 - General Physics Lab | Credit Hours: (1)
    or
PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
    and
PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)
PHYS 2020 - General Physics II Credit Hours: (3)
    and
PHYS 2021 - General Physics Lab II Credit Hours: (1)
    or
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
    and
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
PHYS 3010 - Introduction to Modern Physics Credit Hours: (3)
6 hours UD in PHYS
6 hours UD in PHYS or student's major
    (As approved by Physics Chair or advisor)
```

# **Physics Minor**

# Requirements

Completion of 20 semester hours in physics courses, including

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) (PHYS 2010/PHYS 2011, PHYS 2020/PHYS 2021 are acceptable but not recommended)
12 additional upper division hours.

# Physics, (Accelerated B.S./M.S.)

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

706

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### **Mathematics**

MATH 1910 - Calculus | \*\* Credit Hours: (4)

### **Natural Science**

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

## Electives

Electives must be chosen to bring the total number of hours to 120.

## Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# Accelerated B.S./M.S. Program in Physics

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Physics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in the Department of Physics and Materials Science.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Department of Physics and Materials Science department. Each applicant will complete an interview with the graduate academic coordinator in physics.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in physics. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into the M.S. program of the Department of Physics and Materials Science.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

707

# Physics, (B.S.)/Biomedical Engineering, (M.S.)

Program objectives for a B.S. in Physics are: (a) knowledge of core principles in classical mechanics, electromagnetism, thermal physics, quantum mechanics, mathematical methods, optics, and modern physics; (b) ability to discriminate between relevant and irrelevant principles and facts in problem solving; (c) an understanding of research methodology in physics; (d) ability to effectively communicate scientific results in both oral and written reports; (e) ability to use computers for data analysis, literature search, scientific writing, and the ability to use other specialized research equipment; (f) ability to collaborate with other students in and out of the laboratory and during problem-solving.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following requirements specified for the Physics major:

### **Mathematics**

MATH 1910 - Calculus I \*\* Credit Hours: (4)

### **Natural Science**

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

## Electives

Electives must be chosen to bring the total number of hours to 120.

# **Dual-Degree Programs**

Highly motivated and talented students may pursue an undergraduate degree (B.S.) in Physics followed by a graduate (M.S.) in either Physics or Biomedical Engineering in a special five-year program. This option requires serious commitment, careful planning with the student's advisor, and summer research work leading toward a Master's thesis. Students interested in pursuing this option should contact an undergraduate advisor in the Physics and Materials Science department.

# Honors Program

This program is open to physics majors who maintain an inclusive grade point average of at least 3.25, a cumulative grade point average of at least 3.25 in the major, have achieved junior standing, and have completed PHYS 3010 Students admitted to the honors program must complete 8 hours of upper-division physics honors courses: (1) PHYS 4991/PHYS 4992 Honors Research in Physics, where the student will conduct original scholarly work under the direction of an honors research advisor; (2) PHYS 4999 Senior Honors Thesis, where the student will write a thesis based upon background reading and the experimental research completed in PHYS 4991/PHYS 4992; (3) PHYS 4911 Senior Honors Seminar, where the student will give a presentation based on the work completed in PHYS 4991/PHYS 4992.

Those students who complete the physics honors program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Physics." Moreover, the student's diploma and record at the University of Memphis will reflect this distinction.

# **Department of Political Science**

Program objectives for a B.A. in Political Science are: (a) basic understanding of political institutions and processes in the United States and other countries; (b) basic understanding of the ways in which countries interact with one another, directly or through intermediary institutions; (c) basic understanding of the development of political thought; (d) able to apply basic political science methodologies to political science questions; (e) able to analyze and explain political processes and outcome; (f) able to interpret political attitudes, values, and beliefs; (g) have the critical thinking skills necessary for careers in government, business, law, or academia.

708

# Political Science, (B.A.)

Program objectives for a B.A. in Political Science are: (a) basic understanding of political institutions and processes in the United States and other countries; (b) basic understanding of the ways in which countries interact with one another, directly or through intermediary institutions; (c) basic understanding of the development of political thought; (d) able to apply basic political science methodologies to political science questions; (e) able to analyze and explain political processes and outcome; (f) able to interpret political attitudes, values, and beliefs; (g) have the critical thinking skills necessary for careers in government, business, law, or academia.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (36 hours)

For the purposes of defining undergraduate requirements for the political science major and minor, the department employs four subfields, with the following courses in each:

## American Government and Politics:

POLS 1030 - American Government\*\* Credit Hours: (3) POLS 3211 - State/Local Government Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) POLS 3215 - Interest Groups/Amer Politics Credit Hours: (3) POLS 3216 - Political Parties/Elections \*\* Credit Hours: (3) POLS 3217 - The Political Media \*\* Credit Hours: (3) POLS 3218 - The American Presidency Credit Hours: (3) POLS 3219 - Judicial Process \*\* Credit Hours: (3) POLS 3220 - U. S. Congress Credit Hours: (3) POLS 3221 - Public Opinion Credit Hours: (3) POLS 3222 - Politics, Race, and Cinema Credit Hours: (3) POLS 3405 - Intro Law/Jurisprudence Credit Hours: (3) POLS 4200 - Envrnmntl Law/Policy/Regulatn Credit Hours: (3) POLS 4202 - Constitutional Law: Civil Rights Credit Hours: (3) POLS 4211 - Const Law/National Powers Credit Hours: (3) POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4223 - Issues/Urban Politics Credit Hours: (3)

## **Comparative Politics:**

POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) POLS 3302 - West Europe Govt/Politics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3309 - Govt/Politics of Mid East \*\* Credit Hours: (3) POLS 3310 - Politics/Developed World Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php POLS 3311 - Global Politics and Sports Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3340 - Power/Politics/State Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3) POLS 4315 - Revolution/Political Violence Credit Hours: (3) POLS 4316 - Democratic Erosion Credit Hours: (3) POLS 4317 - Democratic Transitions Credit Hours: (3)

POLS 4820 - Political History of Israel Credit Hours: (3)

POLS 1501 - International Relations\*\* Credit Hours: (3)

### International Relations:

POLS 3505 - International Organizations Credit Hours: (3)
POLS 3506 - American Foreign Policy \*\* Credit Hours: (3)
POLS 3509 - Contmp Prblm Intl Relation Credit Hours: (3)
POLS 4504 - International Law Credit Hours: (3)
POLS 4506 - Prob American Foreign Policy Credit Hours: (3)
POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3)
POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3)
POLS 4511 - International Security Credit Hours: (3)
POLS 4512 - Global Environmental Politics Credit Hours: (3)
POLS 4513 - Human Security Credit Hours: 3

### Political Theory:

- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3)
- POLS 1102 Intro Modern Political Thought \*\* Credit Hours: (3)
- POLS 3102 Religion and Politics Credit Hours: (3)
- POLS 3401 Legal/Pol Thght Classical Credit Hours: (3)
- POLS 3402 Legal/Political Thght Modern Credit Hours: (3)
- POLS 3410 Contemporary Political Thght \*\* Credit Hours: (3)
- POLS 3411 Critical Race Theory Credit Hours: (3)
- POLS 3415 Feminist Political Theory Credit Hours: (3)
- POLS 3420 Race and Politics in U.S. Credit Hours: (3)
- POLS 3430 Conservative Political Thought Credit Hours: (3)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3)
- POLS 4416 African-Am Pol Tht from 1900 Credit Hours: (3)

### Note:

Students must complete POLS 1030 and POLS 4101.

Students must complete at least 6 hours in each of the four subfields listed above.

No more than 9 total hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and study abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 36 hours required for a major in Political Science. Of these 9 hours, no more than three hours of Administrative Internship (POLS 4231), and no more than six total hours in any combination of POLS 4709, POLS 4399, and POLS 4702 may be counted toward the major.

At least 15 hours in political science must be earned in residence at the University of Memphis.

NOTE: Students who have successfully completed an equivalent social statistics course prior to declaring a Political Science major are exempted from the requirement to take POLS 4101, and must substitute another upper-division course in Political Science.

NOTE: The College offers Pre-Law advising for those interested in careers in law. Also, any major in Political Science may earn a second major in International Studies. Political Science courses in International Relations and Comparative Politics fulfill requirements for both the Political Science major and the interdisciplinary major in International Studies.

710

## Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The department offers an honors program to qualified majors who choose to pursue a more sophisticated knowledge of the discipline, a more rigorous level of analysis, and a deeper understanding of politics. Students who have completed 55 hours of course work (with at least 9 hours in Political Science), have an inclusive grade point average of at least 3.0 and a cumulative grade point average of at least 3.25 in the major, or who can present equivalent qualifications, are invited to apply for admission to the program.

The program requires 18 hours of honors course work, 12 or more of which must be upper-division Political Science courses, and minimum final grade point averages of 3.00 overall, 3.25 in Political Science, and 3.25 in honors coursework. Honors students also have the option of completing a Senior Thesis in Political Science (POLS 4999). Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Political Science." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Details of the program are available in the Political Science Office.

# Typical 4-Year Political Science Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3-4) POLS 1030 - American Government\*\* Credit Hours: (3) Elective (3) Foreign Language/B.A. (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) POLS 1501 - International Relations\*\* Credit Hours: (3)

POLS 1101 - Intro Ancient Political Thgt \*\* Credit Hours: (3) or POLS 1102 - Intro Modern Political Thought \*\* Credit Hours: (3)

Foreign Language/B.A. (3)

### Semester Totals 30-31 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

```
History* (3)
Natural Science* (4)
POLS 1301 - Intro to Comparative Politics ** Credit Hours: (3)
Fine Arts* (3)
POLS Political Theory (3)
Natural Science* (4)
Elective (3)
```

### Semester Totals 32 hrs

### Junior Year

```
UD elective (3)
Elective (3)
UD POLS (3)
UD POLS Comparative Politics (3)
POLS 4101 - Political Statistics ** Credit Hours: (3)
UD POLS Amer. Gov. & Policy (3)
UD POLS Amer. Gov. & Policy (3)
UD POLS (3)
UD POLS (3)
UD elective (3)
Elective (3)
```

### Semester Totals 30 hrs

### Senior Year

 POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) or
 POLS 4405 - Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
 Elective (3)

Elective (3) Elective (3) UD elective (3) UD elective (3) UD elective (3) UD elective (3) Elective (4)

Semester Totals 28 hrs

## Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Political Science Minor**

# Requirements

To complete the minor in Political Science, a student must earn 18 hours in political science discipline to the following conditions: a) students must complete at least 3 hours each in three of the four areas listed in the Political Science, (B.A.); b) students must complete at least 9 hours in courses at the 3000-level or higher; c) no more than 6 hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and studies abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 18 hours required for a minor in Political Science.

# Political Science, (Accelerated B.A./M.A)

Program objectives for a B.A. in Political Science are: (a) basic understanding of political institutions and processes in the United States and other countries; (b) basic understanding of the ways in which countries interact with one another, directly or through intermediary institutions; (c) basic understanding of the development of political thought; (d) able to apply basic political science methodologies to political science questions; (e) able to analyze and explain political processes and outcome; (f) able to interpret political attitudes, values, and beliefs; (g) have the critical thinking skills necessary for careers in government, business, law, or academia.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (36 hours)

For the purposes of defining undergraduate requirements for the political science major and minor, the department employs four subfields, with the following courses in each:

## American Government and Politics:

POLS 1030 - American Government\*\* Credit Hours: (3) POLS 3211 - State/Local Government Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) POLS 3215 - Interest Groups/Amer Politics Credit Hours: (3) POLS 3216 - Political Parties/Elections \*\* Credit Hours: (3) POLS 3217 - The Political Media \*\* Credit Hours: (3) POLS 3218 - The American Presidency Credit Hours: (3) POLS 3219 - Judicial Process \*\* Credit Hours: (3) POLS 3220 - U. S. Congress Credit Hours: (3) POLS 3221 - Public Opinion Credit Hours: (3) POLS 3222 - Politics, Race, and Cinema Credit Hours: (3) POLS 3405 - Intro Law/Jurisprudence Credit Hours: (3) POLS 4200 - Envrnmntl Law/Policy/Regulatn Credit Hours: (3) POLS 4202 - Constitutional Law: Civil Rights Credit Hours: (3) POLS 4211 - Const Law/National Powers Credit Hours: (3) POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4223 - Issues/Urban Politics Credit Hours: (3)

### **Comparative Politics:**

POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) POLS 3302 - West Europe Govt/Politics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3309 - Govt/Politics of Mid East \*\* Credit Hours: (3) POLS 3310 - Politics/Developed World Credit Hours: (3) POLS 3311 - Global Politics and Sports Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3340 - Power/Politics/State Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3) POLS 4315 - Revolution/Political Violence Credit Hours: (3) POLS 4316 - Democratic Erosion Credit Hours: (3) POLS 4317 - Democratic Transitions Credit Hours: (3) POLS 4820 - Political History of Israel Credit Hours: (3)

### International Relations:

- POLS 1501 International Relations\*\* Credit Hours: (3) POLS 3505 - International Organizations Credit Hours: (3) POLS 3506 - American Foreign Policy \*\* Credit Hours: (3) POLS 3509 - Contmp Prblm Intl Relation Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3) POLS 4506 - Prob American Foreign Policy Credit Hours: (3) POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3)
- POLS 4511 International Security Credit Hours: (3)
- POLS 4512 Global Environmental Politics Credit Hours: (3)
- POLS 4513 Human Security Credit Hours: 3

### Political Theory:

- POLS 1101 Intro Ancient Political Thgt \*\* Credit Hours: (3) POLS 1102 - Intro Modern Political Thought \*\* Credit Hours: (3) POLS 3102 - Religion and Politics Credit Hours: (3) POLS 3401 - Legal/Pol Thght Classical Credit Hours: (3) POLS 3402 - Legal/Political Thght Modern Credit Hours: (3) POLS 3410 - Contemporary Political Thght \*\* Credit Hours: (3) POLS 3411 - Critical Race Theory Credit Hours: (3) POLS 3415 - Feminist Political Theory Credit Hours: (3) POLS 3420 - Race and Politics in U.S. Credit Hours: (3) POLS 3430 - Conservative Political Thought Credit Hours: (3)
- POLO 5450 Conservative Political Mought Credit Hours: (5)
- POLS 4405 Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)
- POLS 4415 African-Am Pol Thght to 1900 Credit Hours: (3) POLS 4416 - African-Am Pol Tht from 1900 Credit Hours: (3)

#### Note:

Students must complete POLS 1030 and POLS 4101.

Students must complete at least 6 hours in each of the four subfields listed above.

No more than 9 total hours of internship (POLS 4230, POLS 4231), mock trial (POLS 4709), research and study abroad (POLS 4399), and independent study (POLS 4702) combined may be counted toward the 36 hours required for a major in Political Science. Of these 9 hours, no more than three hours of Administrative Internship (POLS 4231), and no more than six total hours in any combination of POLS 4709, POLS 4399, and POLS 4702 may be counted toward the major.

At least 15 hours in political science must be earned in residence at the University of Memphis.

NOTE: Students who have successfully completed an equivalent social statistics course prior to declaring a Political Science major are exempted from the requirement to take POLS 4101, and must substitute another upper-division course in Political Science.

NOTE: The College offers Pre-Law advising for those interested in careers in law. Also, any major in Political Science may earn a second major in International Studies. Political Science courses in International Relations and Comparative Politics fulfill requirements for both the Political Science major and the interdisciplinary major in International Studies.

## Accelerated B.A./M.A Program in Political Science

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Political Science during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Political Science.

714

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Political Science department. Each applicant will complete an interview with the graduate academic coordinator in political science.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in political science. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Political Science department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

## Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The department offers an honors program to qualified majors who choose to pursue a more sophisticated knowledge of the discipline, a more rigorous level of analysis, and a deeper understanding of politics. Students who have completed 55 hours of course work (with at least 9 hours in Political Science), have an inclusive grade point average of at least 3.0 and a cumulative grade point average of at least 3.25 in the major, or who can present equivalent qualifications, are invited to apply for admission to the program.

The program requires 18 hours of honors course work, 12 or more of which must be upper-division Political Science courses, and minimum final grade point averages of 3.00 overall, 3.25 in Political Science, and 3.25 in honors coursework. Honors students also have the option of completing a Senior Thesis in Political Science (POLS 4999). Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degrees conferred "With Honors in Political Science." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Details of the program are available in the Political Science Office.

# Typical 4-Year Political Science Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3-4) POLS 1030 - American Government\*\* Credit Hours: (3) Elective (3) Foreign Language/B.A. (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) POLS 1501 - International Relations\*\* Credit Hours: (3) POLS 1101 - Intro Ancient Political Thgt \*\* Credit Hours: (3) or POLS 1102 - Intro Modern Political Thought \*\* Credit Hours: (3)

Foreign Language/B.A. (3)

### Semester Totals 30-31 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History\* (3) Natural Science\* (4) POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) Fine Arts\* (3) POLS Political Theory (3) Natural Science\* (4) Elective (3) Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Junior Year

```
UD elective (3)
Elective (3)
UD POLS (3)
UD POLS Comparative Politics (3)
POLS 4101 - Political Statistics ** Credit Hours: (3)
UD POLS Amer. Gov. & Policy (3)
UD POLS International Relations (3)
UD POLS (3)
UD elective (3)
Elective (3)
```

### Semester Totals 30 hrs

### Senior Year

 POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) or
 POLS 4405 - Origin/Dev Amer Pol Thought \*\* Credit Hours: (3)

Elective (3) Elective (3) UD elective (3) Elective (4)

### Semester Totals 28 hrs

# Total Hours: 120-122

# Total Hours Required for Graduation: 120

# **Department of Psychology**

Program objectives for a B.A. in Psychology are: (a) describe the nature of psychology as a discipline; (b) use the concepts, language, and major theories of the discipline to account for psychological phenomena; (c) demonstrate knowledge and understanding representing appropriate breadth and depth in selected content areas of psychology; (e) describe the basic characteristics of the science of psychology; (f) explain different research methods used by psychologists; (g) design and conduct basic studies to address psychological questions using appropriate research methods; (h) evaluate the appropriateness of conclusions derived from psychological research; (i) generalize research conclusions appropriately based on the parameters of particular research methods; (j) follow the APA Code of Ethics in the treatment of human and nonhuman participants in the design, data collection, interpretation, and reporting of psychological research; (k) use critical thinking effectively; (l) use reasoning to recognize, develop, defend, and criticize arguments and other persuasive appeals; (m) approach problems effectively; (n) describe major applied areas of psychology (e.g., clinical, counseling, industrial/organizational, school, health); (o) identify appropriate applications of psychology in solving problems; (p) articulate how psychological principles can be used to explain social issues and inform public policy; (q) recognize the necessity for ethical behavior in all aspects of the science and practice of psychology; (s) recognize and understand the importance of academic integrity; (t) recognize and respect human diversity and understand that psychological explanations may vary across populations and contexts; (u) assess and justify engagement with respect to civic, social, and global responsibilities; (v) understand the limitations of psychological knowledge and skills.

# Psychology, (B.A.)

Program objectives for a B.A. in Psychology are: (a) describe the nature of psychology as a discipline; (b) use the concepts, language, and major theories of the discipline to account for psychological phenomena; (c) demonstrate knowledge and understanding representing appropriate breadth and depth in selected content areas of psychology; (e) describe the basic characteristics of the science of psychology; (f) explain different research methods used by psychologists; (g) design and conduct basic studies to address psychological questions using appropriate research methods; (h) evaluate the appropriateness of conclusions derived from psychological research; (i) generalize research conclusions appropriately based on the parameters of particular research methods; (j) follow the APA Code of Ethics in the treatment of human and nonhuman participants in the design, data collection, interpretation, and reporting of psychological research; (k) use critical thinking effectively; (l) use reasoning to recognize, develop, defend, and criticize arguments and other persuasive appeals; (m) approach problems effectively; (n) describe major applied areas of psychology (e.g., clinical, counseling, industrial/organizational, school, health); (o) identify appropriate applications of psychology in solving problems; (p) articulate how psychological principles can be used to explain social issues and inform public policy; (q) recognize the necessity for ethical behavior in all aspects of the science and practice of psychology; (s) recognize and understand the importance of academic integrity; (t) recognize and respect human diversity and understand that psychological explanations may vary across populations and contexts; (u) assess and justify engagement with respect to civic, social, and global responsibilities; (v) understand the limitations of psychological knowledge and skills.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

The Major (35 hours in Psychology)

### Completion of

PSYC 1030 - General Psychology\*\* Credit Hours: (3) PSYC 1300 - Careers in Psychology \*\* Credit Hours: (1) PSYC 3010 - Research and Statistics I \*\* Credit Hours: (4) PSYC 3020 - Research and Statistics II \*\* Credit Hours: (4)

One Course from Each of the Three Content Areas Below:

### Cognitive and Neuroscientific Bases of Behavior:

PSYC 3303 - Thinking/Cognitive Processes \*\* Credit Hours: (3) PSYC 3304 - Perceptual Psychology Credit Hours: (3) PSYC 3306 - Physiological Psyc\*\* Credit Hours: (3) PSYC 3307 - Animal Behavior \*\* Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) PSYC 3530 - Psychology of Language Credit Hours: (3) PSYC 4305 - Mind/Brain/Intelligence \*\* Credit Hours: (3)

#### Social and Developmental Bases of Behavior:

PSYC 3103 - Child Psychology \*\* Credit Hours: (3) PSYC 3106 - Social Psychology \*\* Credit Hours: (4) PSYC 3236 - Psychology of Gender Credit Hours: (3) PSYC 3506 - Human Sexuality Credit Hours: (3) PSYC 4034 - Children Soc Relationships Credit Hours: (3) PSYC 4102 - Abnormal Child Psych Credit Hours: (3)

#### Applications of Behavior:

PSYC 3508 - Indust/Organizatnl Psyc Credit Hours: (3) PSYC 3509 - Applying Psyc/Community Credit Hours: (3) PSYC 3512 - Health Psychology \*\* Credit Hours: (4) PSYC 3520 - Legal/Forensic Psyc Credit Hours: (3) PSYC 4401 - Intro to Clinical Psychology \*\* Credit Hours: (3) PSYC 4507 - Psyc Internship Credit Hours: (3)

### Two of the Following 4-hour Lab Courses

PSYC 3106 - Social Psychology \*\* Credit Hours: (4) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) PSYC 3512 - Health Psychology \*\* Credit Hours: (4)

### **Psychology Field Test**

All majors must take a Psychology Field Test during their senior year.

### Concentrations (24 hours):

The department offers three concentrations: (a) General Psychology (b) Behavioral Neuroscience (c) Cognitive Science. Students must complete the requirements for one concentration.

### General Psychology:

Completion of requirements above and additional upper division hours in PSYC to bring the PSYC total to at least 35 hours.

#### Behavioral Neuroscience:

Completion of requirements above

BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1120 - General Biology || Credit Hours: (3) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1120 - General Chemistry || Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php PSYC 3306 - Physiological Psyc\*\* Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) PSYC 4505 - Special Prob/Behav Neurosci Credit Hours: (3) PSYC 4506 - Direct Rsch Behav Neuro Credit Hours: (3) PSYC 4997 - Senior Thesis/Behav Neurosci Credit Hours: (3) additional upper division hours in PSYC courses to bring their PSYC total to at least 35 hours.

#### Cognitive Science:

Completion of requirements above;

PSYC 3303 - Thinking/Cognitive Processes \*\* Credit Hours: (3)

#### At Least One Course From Either

PSYC 3103 - Child Psychology \*\* Credit Hours: (3) or PSYC 3106 - Social Psychology \*\* Credit Hours: (4)

#### At Least Two Courses From:

PSYC 3304 - Perceptual Psychology Credit Hours: (3) PSYC 3305 - Psyc Learning/Memory\*\* Credit Hours: (3) PSYC 3306 - Physiological Psyc\*\* Credit Hours: (3) PSYC 3530 - Psychology of Language Credit Hours: (3) PSYC 4305 - Mind/Brain/Intelligence \*\* Credit Hours: (3) PSYC 4998 - Sr Thesis/Cognitive Science Credit Hours: (3) or

PSYC 4999 - Honors Sr Thesis/Cognitive Sc Credit Hours: (3)

additional upper division hours in PSYC courses to bring their PSYC total to at least 35 hours.

#### Students Choosing Cognitive Science Concentration

Students choosing Cognitive Science concentration must complete at least three of the following courses outside of psychology:

COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) ENGL 3511 - Intro to Linguistics \*\* Credit Hours: (3) IIS 1010 - Intro to Intelligent Systems Credit Hours: (3) PHIL 3460 - Nature/Mind/Knowledge Credit Hours: (3) PHIL 3621 - Intermediate Logic Credit Hours: (3) PHIL 4421 - Philosophy of Mind Credit Hours: (3)

### Electives

Electives may be chosen to bring the total number of hours to 120.

## Honors Program

The Psychology Honors Program provides an opportunity for selected Psychology majors to enrich their learning experience through honors courses, independent study, a senior thesis, and extracurricular learning experiences. The program requires a minimum of 15 credit hours of honors work in psychology. Students who earn at least a 3.25 cumulative grade point average in the major will earn degrees that included the distinction "With Honors in Psychology." Please contact the department honors coordinator for more detailed information about the Psychology Honors Program and

assistance in applying. Psychology majors may also be eligible to participate in the University Honors Program described elsewhere in this bulletin. Some psychology honors courses may be counted toward the requirement of the University Honors Program.

719

Psychology Honors Classes. The honors courses described below are open only to students in good standing in the Psychology Honors Program or the University Honors Program. Honors courses in Psychology include: (1) PSYC 1030 (General Psychology - Honors). Students who wish to enroll in this course during their first year may do so either by meeting the requirements for the University Honors Program or by instructor permission; (2) periodically offered honors sections of other courses in the psychology curriculum; (3) specialized honors courses; (4) Honors Special Topics; (5) Directed Research and Senior Thesis.

Psychology Honors Contracts. Students may ask the instructor of any psychology course to negotiate an honors contract, in which the instructor and student agree on additional honor-level requirements for the course.

Psychology Honors Senior Thesis. Students ask a psychology faculty member to serve as adviser for PSYC 4996 - Honors Senior Thesis, typically completed during the student's last semester. Before enrolling in PSYC 4996, the student should complete at least one semester of PSYC 4504 - Directed Research under the same faculty adviser who will oversee work in the honors thesis. Students specializing in Behavioral Neuroscience may choose to enroll in PSYC 4506 (Directed Research in Behavioral Neuroscience) and PSYC 4997 (Senior Thesis in Behavioral Neuroscience). The completed thesis is presented in writing and defended orally before a faculty committee.

# Typical 4-Year Psychology Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH (3-4) \* PSYC 1030 - General Psychology\*\* Credit Hours: (3) PSYC 1300 - Careers in Psychology \*\* Credit Hours: (1) Foreign Language/B.A. (3) Elective (ACAD 1100) (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Humanities (3) \* PSYC Content Area 1 (3) Elective (3) Foreign Language/B.A. (3)

### Semester Totals 31-32 hrs

### Sophomore Year

PSYC 3010 - Research and Statistics I \*\* Credit Hours: (4) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

PSYC Content Area 2 (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Foreign Language/B.A. (3)

```
PSYC 3020 - Research and Statistics II ** Credit Hours: (4)
PSYC Content Area 3 (3)
History (3) *
Foreign Language/B.A. (3)
```

### Semester Totals 29 hrs

### Junior Year

Fine Arts (3) \* UD PSYC (3) Natural Science (4) \* Elective (3) Elective (3)

History (3) \* UD PSYC (3) Elective (3) Social/Behavioral Sciences (3) \* Elective (3)

### Semester Totals 31 hrs

### Senior Year

UD PSYC w/lab (4) Elective (3) Elective (3) UD Elective (3) UD Elective (2)

UD PSYC w/lab (4) Natural Science (4) \* UD Elective (3) UD Elective (3)

Semester Totals 29 hrs

Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Psychology Minor**

# Requirements

Completion of 20 semester hours in psychology, including

PSYC 1030 - General Psychology\*\* Credit Hours: (3)
PSYC 3010 - Research and Statistics I \*\* Credit Hours: (4)
PSYC 3020 - Research and Statistics II \*\* Credit Hours: (4) (or equivalent)
9 additional upper-division hours.

# **Department of Sociology**

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# Sociology Honors, (B.A.)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in sociology,

```
SOCI 1010 - Introduction to Sociology ** Credit Hours: (3)
SOCI 3311 - Social Statistics ** Credit Hours: (3)
SOCI 3322 - Methods of Social Research ** Credit Hours: (3)
SOCI 4210 - Rise of Sociological Theory Credit Hours: (3)
SOCI 4211 - Contemp Sociological Theory ** Credit Hours: (3)
SOCI 4299 - Senior Thesis Seminar** Credit Hours: (3)
SOCI 4998 - Honors Thesis Credit Hours: (3) (for Honors students) or
SOCI 4995 - Senior Capstone Seminar** Credit Hours: (3)
```

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Honors Program

The Honors Program in Sociology requires 18 hours of honors work, at least 12 hours of which must be upper-division sociology courses. To complete the Honors Program, a student must have a minimum overall final grade point average of 3.00 in Sociology, and a 3.25 grade point average in honors course work.

Those students who complete the program and the regular college requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Sociology." Moreover, the student's diploma and the record at the University of Memphis will reflect this distinction. Please see the department's Faculty Honors Advisor for more details on the program.

# Typical 4-Year Sociology Sequence

## Freshman Year

First Semester

SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3) Foreign Language/B.A. (3) Elective (3) Semester Total: 15 hrs

#### Second Semester

Humanities\* (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Foreign Language/B.A. (3) Social/Behavioral Sciences\* (3) Semester Total: 15 hrs

#### Semester Totals 30 hrs

#### Sophomore Year

#### **First Semester**

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History\* (3) Elective (3) Natural Science\* (4) Elective (3) Semester Total: 16 hrs Second Semester UD SOCI (3) Fine Arts\* (3) History\* (3) Natural Science\* (4) Elective (3) Semester Total: 16 hrs Semester Totals 32 hrs

#### Junior Year

#### First Semester

SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3) UD SOCI (3) Elective (3) UD elective (3) Elective (3) Semester Total: 15 hrs

Second Semester SOCI 4210 - Rise of Sociological Theory Credit Hours: (3) or SOCI 4211 - Contemp Sociological Theory \*\* Credit Hours: (3) UD SOCI (3) UD SOCI (3) UD elective (3)

#### Semester Totals 30 hrs

## Senior Year

First Semester SOCI 3311 - Social Statistics \*\* Credit Hours: (3) UD Elective (3) UD sOCI (3) UD elective (3) Elective (3) Semester Total: 15 hrs

Second Semester SOCI 4995 - Senior Capstone Seminar\*\* Credit Hours: (3) or SOCI 4999 - Senior Thesis Seminar\*\* Credit Hours: (3) UD elective (3) Elective (3) Elective (4) Semester Total: 13 hrs

Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Sociology, (B.A.)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours in sociology,

SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)
 SOCI 3311 - Social Statistics \*\* Credit Hours: (3)
 SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3)
 SOCI 4210 - Rise of Sociological Theory Credit Hours: (3)
 or
 SOCI 4211 - Contemp Sociological Theory \*\* Credit Hours: (3)

SOCI 4999 - Senior Thesis Seminar\*\* Credit Hours: (3) or
 SOCI 4998 - Honors Thesis Credit Hours: (3) (for Honors students) or
 SOCI 4005 - Senior Constants Seminar\*\* (in 1/4 Hours (2))

SOCI 4995 - Senior Capstone Seminar\*\* Credit Hours: (3) Plus 15 additional upper-division hours in SOCI.

# Electives

Electives must be chosen to bring the total number of hours to 120.

# Typical 4-Year Sociology Sequence

## Freshman Year

First Semester SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3) Foreign Language/B.A. (3) Elective (3) Semester Total: 15 hrs

#### Second Semester

Humanities\* (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Foreign Language/B.A. (3) Social/Behavioral Sciences\* (3) Semester Total: 15 hrs

#### Semester Totals 30 hrs

#### Sophomore Year

First Semester ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History\* (3) Elective (3) Natural Science\* (4) Elective (3) Semester Total: 16 hrs Second Semester UD SOCI (3) Fine Arts\* (3) History\* (3) Natural Science\* (4) Elective (3) Semester Total: 16 hrs

#### Semester Totals 32 hrs

#### Junior Year

#### First Semester

SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3) UD SOCI (3) Elective (3) UD elective (3) Elective (3) Semester Total: 15 hrs

#### Second Semester

SOCI 4210 - Rise of Sociological Theory Credit Hours: (3) or SOCI 4211 - Contemp Sociological Theory \*\* Credit Hours: (3)

UD SOCI (3) UD SOCI (3) UD elective (3) Elective (3) Semester Total: 15 hrs

#### Semester Totals 30 hrs

#### Senior Year

First Semester SOCI 3311 - Social Statistics \*\* Credit Hours: (3) UD Elective (3) UD SOCI (3) UD elective (3) Elective (3) Semester Total: 15 hrs

Second Semester SOCI 4995 - Senior Capstone Seminar\*\* Credit Hours: (3) or SOCI 4999 - Senior Thesis Seminar\*\* Credit Hours: (3) UD elective (3) Elective (3) Elective (4) Semester Total: 13 hrs

Semester Totals 28 hrs

Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# **Sociology Minor**

### Requirements

SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) and 15 upper-division hours in SOCI.

# Sociology, (Accelerated B.A./M.A)

Program objectives for a B.A. in Sociology are: (a) an understanding of and competence in the major theories, statistical techniques, and methodological approaches of sociology; (b) development of theoretical, substantive, and methodological knowledge to conduct research projects or participate in applied research projects; (c) participation in an internship or discipline related experiences; (d) preparation for employment in a sociology-related field or advanced study in sociology or other graduate field.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (30 hours)

Completion of 30 semester hours in sociology,

```
SOCI 1010 - Introduction to Sociology ** Credit Hours: (3)
SOCI 3311 - Social Statistics ** Credit Hours: (3)
SOCI 3322 - Methods of Social Research ** Credit Hours: (3)
SOCI 4210 - Rise of Sociological Theory Credit Hours: (3)
or
SOCI 4211 - Contemp Sociological Theory ** Credit Hours: (3)
SOCI 4211 - Contemp Sociological Theory ** Credit Hours: (3)
SOCI 4999 - Senior Thesis Seminar** Credit Hours: (3)
or
SOCI 4998 - Honors Thesis Credit Hours: (3) (for Honors students) or
SOCI 4995 - Senior Capstone Seminar** Credit Hours: (3)
Plus 15 additional upper-division hours in SOCI.
```

#### Electives

Electives must be chosen to bring the total number of hours to 120.

Accelerated B.A./M.A. Program in Sociology

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Sociology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Sociology.

727

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Sociology department. Each applicant will complete an interview with the graduate academic coordinator in sociology.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in sociology. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Sociology department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Typical 5 Year Accelerated BA/MA Sociology Sequence (Thesis) (GA)

(SOCI 7210, SOCI 7320 and SOCI 6312 in senior year count as both grad and undergrad)

## Freshman Year (31 hrs)

#### First Semester Freshman

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3) or
MATH 1710 - College Algebra Credit Hours: (3)
BA Foreign Language 1010 (3)
Lower Division Elective (3)
SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

#### Second Semester Freshman

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Natural Science (4) Social/Behavioral Science BA Foreign Language 1020 Humanities

#### Sophomore Year (31 hrs)

#### First Semester Sophomore

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
BA Foreign Language 2010
Natural Science (4)
SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3)

#### Second Semester Sophomore

SOCI 3311 - Social Statistics \*\* Credit Hours: (3) Fine Arts BA Foreign Language 2020 Elective (3) Elective (3)

#### Junior Year (36 hrs)

#### First Semester Junior

SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3) Upper Division Electives (6) Lower Division Electives (6) History

#### Second Semester Junior

SOCI 4210 - Rise of Sociological Theory Credit Hours: (3) or
 SOCI 4211 - Contemp Sociological Theory \*\* Credit Hours: (3)
 Upper Division Electives (6)
 Lower Division Electives (6)
 Upper Division SOCI

#### Senior Year (27 hrs)

#### **First Semester Senior**

SOCI 4999 - Senior Thesis Seminar\*\* Credit Hours: (3) Elective (3) SOCI 7210 SOCI 7230

#### Second Semester Senior

Upper Division Elective (6) Lower Division Elective (3) SOCI 6312 SOCI 7000 level

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Courses offered only online or both online and on-ground

# Fifth Year MA Program (24 hrs)

Total Hours Require for MA thesis option: 30

This plan: 30 (SOCI 7210, SOCI 7320 and SOCI 6312 in senior year count as both grad and undergrad; SOCI 7914 does not count toward this 30) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### First Semester 5th Year

SOCI 7000 level SOCI 7996 Grad Elective SOCI 7914

## Second Semester 5th Year

SOCI 7996 Grad Elective Grad Elective SOCI 7914

# **School of Social Work**

The main goal of the baccalaureate social work program is to prepare students for entry level generalist practice. A secondary goal is to provide a strong foundation for students who wish to pursue social work education at the graduate level. Social service and life experiences may not be substituted for any social work course. The social work program is accredited by the Council on Social Work Education.

# Social Work, (B.A.)

The B.A. program in Social Work is designed to equip students with the knowledge and skills necessary for entrance into the profession of social work as beginning level generalist practitioners. Program objectives for a B.A. in Social Work are: a) apply critical thinking skills within the context of professional social work practice; (b) understand the value base of the profession and its ethical standards and principles, and practice accordingly; (c) practice without discrimination to needs of diverse clientele; (d) apply strategies of advocacy and social change that advance social and economic justice. Many social work courses have service-learning requirements and an internship is required.

## Admission:

Progression to the major of "Social Work" will occur only after the student successfully completes the the following course with a minimum grade of "C-":

SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2011 - Writing for Social Work Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

Students majoring in Social Work must take SOCI 3422 to fulfill part of the University General Education History requirement and ANTH 1200 for Social/Behavioral Sciences.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements.

# Note:

Successful student progression requires each student to earn a minimum grade of "C" in all required courses for social work majors. Students repeating two required classroom courses for the major or field instruction will have an academic review by department faculty in the term following the second course repetition. Students should have a minimum of 30 hours completed before entering the introductory social work courses including:

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) Two courses from:
SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)
PSYC 1030 - General Psychology\*\* Credit Hours: (3)
POLS 1030 - American Government\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)

# The Major (39 hours in addition to University General Education Program requirements)

Completion of

SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2011 - Writing for Social Work Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3) SWRK 3903 - Social Work Practice | Credit Hours: (4) SWRK 3904 - Social Work Practice II Credit Hours: (3) SWRK 3906 - Social Work Practice III Credit Hours: (3) SWRK 3920 - Soc Welfare Policy/Programs Credit Hours: (3) SWRK 3930 - Intro Soc Work Research Credit Hours: (3) SWRK 4830 - Field Instruction Soc Work | Credit Hours: (3) SWRK 4831 - Field Instruction Soc Work II Credit Hours: (4) SWRK 4840 - Integrative Field Seminar | Credit Hours: (2) SWRK 4841 - Integrative Field Seminar II Credit Hours: (2) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) (included in the University General Education Program requirements) PHIL 1611 - Elementary Logic \*\* Credit Hours: (3) and

SOCI 3311 - Social Statistics \*\* Credit Hours: (3)

## Electives

Electives may be chosen to bring the total number of hours to 120.

# Typical 4-Year Social Work Sequence

#### Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH (3-4) \* ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) Foreign Language/B.A. (3) Elective (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) PHIL 1611 - Elementary Logic \*\* Credit Hours: (3) Humanities (3) \* Foreign Language/B.A. (3) Social/Behavioral Sciences (3) \*

#### Semester Totals 30-31 hrs

#### Sophomore Year

First Semester

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Natural Science (4) SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2011 - Writing for Social Work Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Second Semester

History (3)\* Fine Arts (3)\* Natural Science (4) SWRK 3920 - Soc Welfare Policy/Programs Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

#### **First Semester**

SWRK 3903 - Social Work Practice | **Credit Hours:** (4) SWRK 3930 - Intro Soc Work Research **Credit Hours:** (3) Social Science\* (3) SOCI 3311 - Social Statistics \*\* **Credit Hours:** (3) SOCI 3422 - Racial/Ethnc Minorities \*\* **Credit Hours:** (3)

#### Second Semester

Elective (3) SWRK 3904 - Social Work Practice II Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) SWRK 3906 - Social Work Practice III Credit Hours: (3) UD Elective (3)

#### Semester Totals 31 hrs

#### Senior Year

```
SWRK 4830 - Field Instruction Soc Work | Credit Hours: (3)
SWRK 4840 - Integrative Field Seminar | Credit Hours: (2)
Elective (3)
SWRK 4841 - Integrative Field Seminar II Credit Hours: (2)
UD elective (3)
SWRK 4831 - Field Instruction Soc Work II Credit Hours: (4)
Elective (3)
Elective (3)
```

#### Semester Totals 27 hrs

Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

For the General Education Social/Behavioral Science and Additional Social Science - Complete 2 of the following: SOCI 1010, POLS 1030 and ECON 2020.

# **Social Work Minor**

## Requirements

Completion of 21 semester hours in sociology and social work courses including

SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)
SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3)
SWRK 2011 - Writing for Social Work Credit Hours: (3)
SWRK 2911 - Soc Response to Human Need Credit Hours: (3)
9 additional upper division hours in social work courses.

# **Department of World Languages and Literatures**

Program objectives for a B.A. in World Languages and Literatures are: (a) have functional control of the appropriate fundamental language skills for the principal language of the major. For modern languages, these include speaking, listening, reading, and writing. For ancient languages, these include reading, reciting in a standard scholarly reconstructed pronunciation, and the ability to analyze grammatical structures in detail; (b) be able to describe and critically evaluate the cultural assumptions and points of view of the targeted culture(s) of their principal language of concentration; (c) Be able to describe and appreciate the interplay of literature, language, history, and culture in the principal language of concentration.

# World Languages and Literatures, (B.A.)

Program objectives for a B.A. in World Languages and Literatures are: (a) have functional control of the appropriate fundamental language skills for the principal language of the major. For modern languages, these include speaking, listening, reading, and writing. For ancient languages, these include reading, reciting in a standard scholarly reconstructed pronunciation, and the ability to analyze grammatical structures in detail; (b) be able to describe and critically evaluate the cultural assumptions and points of view of the targeted culture(s) of their principal language of concentration; (c) Be able to describe and appreciate the interplay of literature, language, history, and culture in the principal language of concentration.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements and are listed above.

# The Major (24-33 hours)

Successful completion of one of the following concentrations:

A single-language concentration in French, Chinese, German, Italian, Japanese, or \*Spanish: 24 upper division semester hours.

- A two-language concentration chosen from Chinese, French, German, Italian, Japanese, Portuguese, Russian, and Spanish: 27 upper division semester hours with a minimum of 9 semester hours in each language.
- A three-language concentration chosen from Chinese, French, German, Italian, Japanese, Portuguese, Russian, and Spanish: All three language concentrations require prior consultation with the approval of the department chair. Plans will normally include at least 33 upper division semester hours to include at least 12 semester hours in each of two languages plus approved course work in a third language. The online catalog can be accessed at: http://catalog.memphis.edu/index.php

\* Students with a single-language concentration in Spanish must take

SPAN 4410 - Spanish Lit and Civilization Credit Hours: (3) SPAN 4510 - Spanish Amer Lit/Civilization Credit Hours: (3) SPAN 4563 - Hispanic Literature Genres Credit Hours: (3)

## Electives

Electives may be chosen to bring the total number of hours to 120.

## Typical 4-Year French Concentration Sequence

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
Social/Behavioral Science (3) *
Elective (3)
FREN 2010 - Intermediate French I Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Elective (3)
Social/Behavioral Science (3) *
Humanities (3) *
FREN 2020 - Intermediate French II Credit Hours: (3)
```

#### Semester Totals 30-31 hrs

#### Sophomore Year

```
COMM 2381 - Oral Communication ** Credit Hours: (3)
Elective (3)
Natural Science (4) *
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

#### Semester Totals 32 hrs

#### Junior Year

History (3) \* Fine Arts (3) \* Elective (3) UD FREN (3) UD Elective (3) History (3) \* Elective (3) UD FREN (3) UD Elective (3) Elective (3)

#### Semester Totals 30 hrs

### Senior Year

UD FREN (3) UD FREN (3) Elective (3) UD elective (3) UD elective (3) UD FREN (3) UD elective (3) Elective (4)

#### Semester Totals 28 hrs

Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Spanish Concentration Sequence

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH (3-4) *
Social/Behavioral Science (3) *
SPAN 2010 - Intermediate Spanish I** Credit Hours: (3)
Elective (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Elective (3)
Social/Behavioral Science (3) *
SPAN 2020 - Intermediate Spanish II** Credit Hours: (3)
Humanities (3)
```

#### Semester Totals 30-31 hrs

#### Sophomore Year

```
COMM 2381 - Oral Communication ** Credit Hours: (3)

Fine Arts (3) *

Natural Science (4) *

UD SPAN (3)

ENGL 2201 - Literary Heritage ** Credit Hours: (3)

or

ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)

UD elective (3)

Elective (3)

Natural Science (4) *

UD SPAN (3)

UD SPAN (3)
```

#### Semester Totals 32 hrs

## Junior Year

History (3) \* UD SPAN (3) Elective (3) UD elective (3) UD elective (3) History (3) \* Elective (3) Elective (3) UD Elective (3) SPAN 4563 - Hispanic Literature Genres Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

Elective (3) SPAN 4410 - Spanish Lit and Civilization **Credit Hours: (3)** UD SPAN (3) UD elective (3) Elective (3) SPAN 4510 - Spanish Amer Lit/Civilization **Credit Hours: (3)** UD elective (3) UD elective (3) Elective (4)

## Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **World Languages and Literatures Minor**

Completion of 18 semester hours consisting of (1) courses numbered 1020, 2010, and 2020 (or their equivalents) in the foreign language in which upper division hours are to be taken, and (2) 9 upper division semester hours in one of the following languages: Chinese, French, German, Italian, Japanese, Russian, or Spanish. Students placing directly into 2010 or higher on the Foreign Language placement exam may complete the requirements for the minor by either: (1) applying for retroactive credit for 1020 and any subsequent courses out of which they have placed; or (2) completing additional upper-division hours to bring the total number of hours for the minor to 18.

# **Arts and Sciences**

# Bachelor of Arts (B.A.) (6-9 hours)

These hours are in addition to the University General Education Program requirements.

Foreign Language: 6 hours in a single foreign language at or above the 2000 level or equivalent.

If the language chosen was used to meet University admissions requirements, students must take the foreign language placement exam (if they have not already successfully completed a language course at an accredited institution of higher education). For information about the dates and place of placement exams, contact the Department of World Languages and Literatures. On the basis of the results of the placement exam, students should follow these guidelines:

If placed into 1010: complete 1010, 1020, 2010, 2020

If placed into 1020: complete 1020, 2010, 2020

If placed into 2010: complete 2010, 2020

If placed into 2020: complete 2020

If placed into 3301 or higher: language requirement fulfilled

Or complete 6 hours at the 2000 level or above of another language

Students presenting a language to meet University admission requirements cannot receive credit for 1010 in that language. No credit hours are immediately granted on the basis of the placement exam.

Satisfactory completion of the language requirement by means of the placement exam will be noted on the student's transcript.

- Students whose first college-level language course is 2010 or higher and who pass this course with a minimum grade of "C" may apply for Credit by Course Placement. The applicable fees are listed in the Miscellaneous Fees section of this Catalog. Students wishing such credit must make written application to the chair of the Department of World Languages and Literatures. Credit by Course Placement shall apply only to the lower division, and credit gained in this manner shall not exceed 12 semester hours in any one language. For additional information, see Credit by Course Placement.
- Once a student begins with a lower-division course, all remaining higher-numbered courses in the lower division must be taken in sequence, without skipping. For example, students who begin with LATN 1010 cannot skip LATN 1020 and enroll in LATN 2010.
- For students whose mother tongue is not English, lower-division credit in the native language will be awarded when the student has successfully completed the English composition requirement for graduation and has proven proficiency in the native language to the satisfaction of the Department of World Languages and Literatures. The student must make written application to the chair of the Department of World Languages and Literatures.

# American Sign Language as World Language

American Sign Language 2010 and 2020 are acceptable courses to satisfy the foreign language requirement of some bachelor's degrees (While courses are offered 2019/2020, courses may be taken to satisfy the requirement which is effective Fall 2020). These courses are offered through the School of Communication Sciences and Disorders. Click on Communication Sciences and Disorders for more information.

Unless a student has waived out of the introductory level (1000) courses, he or she will need to plan on four semesters of American Sign Language (ASL):

AUSP 1010: Introduction to ASL 1

AUSP 1020: Introduction to ASL 2

AUSP 2010: Intermediate ASL 1

AUSP 2020: Intermediate ASL 2

737 Fine Arts: (Required only if a Fine Arts course was not taken to fulfill General Education requirements): 3 hours from: ART 1030, ARTH 2010, ARTH 2020, COMM 1851, COMM 4850, COMM 4858, DANC 1151, DANC 3101, MUS 1030, MUS 1040, MUHL 4800, THEA 1030, THEA 4542, THEA 4543.

NOTE: The College of Arts and Sciences accepts a maximum of two semester hours in physical activity courses toward the fulfillment of its degree requirements.

To qualify for the Bachelor of Arts degree, the student must complete a minimum of 120 qualifying semester hours with a grade point average of 2.0. A minimum of 42 semester hours must be in courses from the upper division. A minimum grade of "C" is required in every course applicable toward a major or minor (including corequisites). A minimum cumulative GPA of 2.0 is required for courses applied to the major.

# **Residence Requirements**

University residence requirements are explained in detail in the Graduation from the University section. A transfer student in The College of Arts and Sciences must earn at least 6 semester hours in residence in the major subject and at least 3 semester hours in the minor. These credits may be earned only through regular class enrollment for a letter grade.

# **Bachelor of Science (B.S.)**

Any course requirements over and above University General Education and departmental course requirements in the major shall be determined by the individual departments consistent with university approval processes.

NOTE: The College of Arts and Sciences accepts a maximum of two semester hours in physical activity courses toward the fulfillment of its degree requirements.

To qualify for the Bachelor of Science degree, the student must complete a minimum of 120 qualifying semester hours with a grade point average of 2.0. A minimum of 42 semester hours must be in courses from the upper division. A minimum grade of "C" is required in every course applicable toward a major or minor (including corequisites). A minimum cumulative GPA of 2.0 is required for courses applied to the major.

# **Prior Learning Assessment**

Students who wish to accelerate the completion of their degree may be eligible to earn credit through Prior Learning Assessment (PLA) which includes Experiential Learning, credit earned through CLEP or DSST standardized exams, or departmental credit by examination. For more information on Prior Learning Assessment see here.

# **College of Communication and Fine Arts**

ANNE F. HOGAN, Ph.D., Dean Room 232, Communication Fine Arts Building (901) 678-2350 http://ccfa.memphis.edu/

The College of Communication and Fine Arts has four primary functions. First, it offers courses of study aimed at preparing its students to work toward careers in architecture and interior design, the fine or applied arts, communication, journalism and strategic media or the performing arts, whether as practitioners, teachers, artists, or consultants. Second, the college affords broad exposure and instruction in fine arts, communication, journalism and strategic media to students of other colleges in the university whose degree programs may be enhanced by such exposure. Third, with a view toward individual professional growth as well as general cultural enhancement, the college vigorously promotes scholarly research, professional practice, and artistic production. Finally, the college seeks to enrich the cultural atmosphere of both the university and the community at large through a continuing variety of public programs, to include art exhibitions, media presentations, dramatic and dance productions, concerts, recitals, lectures, seminars, debates, workshops, festivals, and the like.

Through the diversity of these constituent elements, the college reflects the unity and challenge facing the communicative artist and scholar. Ultimately it is our goal to foster a more intense and profound awareness of the broad range of human experience from which the college derives its pertinence and vitality.

# Philosophy

The College of Communication and Fine Arts is focused ultimately upon visual and audible symbols, whose rational and emotional values it is the mission of the college to create and explore. In the belief that perception is largely shaped by experience, The College of Communication and Fine Arts offers a range of symbolically rendered experiences, both individual and collective, in the hope of broadening and sensitizing the perceptions of its students.

The kind of symbolic experience that communicates emerges when, in Ruskin's phrase, "the hand, the head and the heart of man go together." Students in The College of Communication and Fine Arts receive individual and small group instruction toward this end. In the hope of furthering the capacity to impose a pattern on experience and to recognize the patterns offered by others, students of the college are exposed additionally to courses drawn from a broad base of the liberal arts.

The faculty of the college represents a diversity of academic and artistic backgrounds and interests, reflected not only in its teaching, but also in research and creative activities. It is a faculty united in the attempt to maintain the highest standards in both classroom and studio work, standards that find their limits at last only in the mystery and wonder of the human experience from which they rise.

# Organization

The College of Communication and Fine Arts comprises six academic departments: Architecture, Art, Communication and Film, Journalism and Strategic Media, Music, and Theatre and Dance. The requirements for the majors and minors offered by these departments are listed later in this section.

# **Degrees Offered**

A student may earn a Bachelor of Fine Arts, Bachelor of Music, or Bachelor of Arts degree, by majoring in one of the six departments that constitute the College of Communication and Fine Arts. The following is an outline by majors and concentrations areas offered by the departments in the College of Communication and Fine Arts.

A minimum grade of "C-" is required in every course applicable toward a major or minor.

Credit in the College of Communication and Fine Arts may be granted for validated learning from experience or non-traditional instruction. Guidelines for this procedure may be obtained in the office of the Dean of the College of Communication and Fine Arts.

#### **Bachelor of Fine Arts Degree Requirements**

In Architecture

In Art with concentrations in Art Education, Studio Arts, Graphic Design and Photography In Interior Architecture

In Theatre with concentrations in Dance, Dance Science, Design and Technical Production, Performance, and Musical Theatre

#### **Bachelor of Music Degree Requirements**

In Music with concentrations in Commercial Music Performance, Composition, Jazz and Studio Performance, Music History, Performance, Music Education Instrumental, Music Education Choral

In Music Industry with concentrations in Music Business and Recording Technology

#### **Bachelor of Arts Degree Requirements**

In Advertising

In Art History with concentrations in African Diaspora Arts Visual Culture, Ancient Egyptian Art and Culture, and European Tradition in Art In Communication with concentrations in Communication Studies and Film and Video Production

In Journalism with concentrations in Journalism and Creative Mass Media

In Public Relations with concentrations in Public Relations and Strategic Social Media

Students receiving a Bachelors of Arts must complete the following hours in addition to the University General Education Program requirements.

Foreign Language: 6 hours in a single foreign language at or above the 2000 level or equivalent

# **Residency Requirements**

University residence requirements are explained in detail in the Graduation from the University section. A transfer student in The College of Communication and Fine Arts must earn at least 6 semester hours in residence in the major subject and a minimum of 3 semester hours in the minor. These credits may be earned only through regular class enrollment for a letter grade.

Individual program requirements described in the University of Memphis Undergraduate Catalog are subject to change. Please consult the college level advisor for changes that may occur before publication of the next issue of this catalog.

# **Department of Architecture**

The mission of the Department of Architecture is to prepare graduates to enter the professional practice of architecture and interior design and to serve the Memphis and Mid-South region through research, engaged scholarship, interdisciplinary collaboration, and creative expression that contributes to sustainable, stable communities and enhances the quality of life for all citizens.

The goals and objectives of the Department are as follows: to provide the highest quality professional education through a well-rounded discoverybased curriculum in both the art and science of design with emphasis on processes, professional standards, and the practical application of design and technology; to provide research opportunities for faculty and students with emphasis on "hands on" multi-disciplinary projects through which students gain valuable professional experience while providing services to the citizens of the region; and to expand opportunities for Architecture and Interior Architecture students by bringing them together with faculty and students in the City Planning, Real Estate Development, and other programs to address public issues, support stable and sustainable neighborhoods, and develop community visions throughout the region.

# **Architecture Honors**

The Department of Architecture Honors Program provides an opportunity for selected Architecture and Interior Architecture students to enrich their learning experience through honors courses, independent study, a senior thesis, and extracurricular learning experiences. The Honors Program requires a minimum of 15 semester hours of honors work in courses within the Department of Architecture. Students who complete the appropriate degree program with a 3.25 cumulative grade point average will earn a degree that includes the distinction "Honors in Architecture." Moreover, the diploma and record at the University of Memphis will reflect this accomplishment. Please contact the Department of Architecture honors coordinator for more detailed information.

# Architecture, (B.F.A.)

The Bachelor of Fine Arts with a major in Architecture is a pre-professional degree. At the University of Memphis, the professional degree in Architecture is the Master of Architecture degree which is accredited by the National Architectural Accrediting Board (NAAB). See the Graduate Catalog for details.

**NOTE:** All applicants seeking admission to the B.F.A. with a major in Architecture must complete and submit to the Department of Architecture an application form, a writing assignment, and a portfolio of five representative works. These three components comprise the Entrance Evaluation for Architecture and will be reviewed by a faculty committee. Applicants are accepted on the basis of potential in the field of architecture. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any Architecture courses for which a permit is required beyond first semester, first year is based upon this review. Contact the Department of Architecture for details and deadline.

740

Students transferring from another major or another institution who intend to pursue a B.F.A. degree with a major in Architecture must complete the Department of Architecture Entrance Evaluation. Transfer students seeking advanced standing in the Architecture major should submit a portfolio of work representing previously completed Architecture studio work. The review committee will determine if the portfolio work is equivalent to comparable courses at the University of Memphis. Placement in the major is dependent upon the review. Even if admitted to advanced standing, the student may be required to remedy previous course deficiencies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note the following are specified by the department for this program:

## Mathematics:

MATH 1730 - Pre-Calculus\*\* Credit Hours: (4) or MATH 1830 - Elementary Calculus\*\*

## Social/Behavioral Sciences:

ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) and SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

## Natural Science:

PHYS 2010 - General Physics | Credit Hours: (3) and
PHYS 2011 - General Physics Lab | Credit Hours: (1) and
ESCI 1010 - Weather and Climate Credit Hours: (4) or
ESCI 1020 - Landforms \*\* Credit Hours: (4) or
ESCI 1040 - Physical Geology Credit Hours: (4) plus labs Note: All of these Natural Science courses require a lab component.

## Humanities:

```
ARTH 2010 - World Art I Credit Hours: (3)
and
ARTH 2020 - World Art II Credit Hours: (3)
```

## History:

```
HIST 1110 - World History to 1500** Credit Hours: (3)
and
HIST 1120 - World History since 1500** Credit Hours: (3)
```

# The Major (87 hours)

- ARCH 1111 Fundamentals of Design Studio Credit Hours: (3) ARCH 1112 - Architecture Graphics Studio Credit Hours: (3) ARCH 1113 - Design Visualization Credit Hours: (3) ARCH 1120 - Intro to Architecture + Design Credit Hours: (3) ARCH 1211 - History of Architecture 1 Credit Hours: (3) ARCH 2212 - History of Architecture 2 Credit Hours: (3) ARCH 2411 - Building Technology 1 Credit Hours: (3) ARCH 2412 - Building Technology 2 Credit Hours: (3) ARCH 2611 - Computer Apps in Design 1 Credit Hours: (3)
- ARCH 2711 Design Studio 1 Credit Hours: (5)

#### The Major

#### Entrance - Completion of Major Core (32 hours)

Candidacy Review and Portfolio Requirements - A Candidacy Review Portfolio is required of all students intending to major in Architecture. Admission to the University of Memphis and completion of the major core do not guarantee placement in the program. Admission is selective and is based on a portfolio evaluation reflecting professional standards and expectations of the major. A portfolio that includes but is not limited to works from the major core courses is required as part of the application. Guidelines and application forms for admission to the Architecture major are available in the department office and from faculty advisors. Consultation with a faculty advisor is recommended before or during portfolio preparation. Students may submit portfolios for review no earlier than the semester that Candidacy requirements are being completed.

Transfer students must meet entrance requirements of the major. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any 3000-4000 level Architecture course is based upon this review.

## Completion of Major (52 hours)

ARCH 2612 - Computer Apps in Design 2 Credit Hours: (3)
ARCH 2712 - Design Studio 2 Credit Hours: (5)
ARCH 3221 - Determinants of Modern Design Credit Hours: (3)
ARCH 3222 - Contemporary Architecture 1 Credit Hours: (3)
ARCH 3321 - Structural Design 1 Credit Hours: (3)
ARCH 3322 - Structural Design 2 Credit Hours: (3)
ARCH 3421 - Environmental Systems Credit Hours: (3)
ARCH 3613 - Computer Apps in Design 3 Credit Hours: (3)
ARCH 3713 - Design Studio 3 Credit Hours: (5)
ARCH 4231 - Issues in City Building Credit Hours: (3)
ARCH 4441 - Construction Documents Credit Hours: (3)
ARCH 4715 - Design Studio 5 Credit Hours: (5)
ARCH 4716 - Design Studio 6 Credit Hours: (5)

# Electives (3 hours)

Architecture upper division (3/4000 level) elective to complete the 87 semester hours of Architecture course work. See advisor for details.

# Typical 4-Year Architecture Sequence

## Freshman Year

ARCH 1112 - Architecture Graphics Studio Credit Hours: (3) ARCH 1120 - Intro to Architecture + Design Credit Hours: (3) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) HIST 1110 - World History to 1500\*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) ARCH 1111 - Fundamentals of Design Studio Credit Hours: (3) ARCH 1113 - Design Visualization Credit Hours: (3) ARCH 1211 - History of Architecture 1 Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) HIST 1120 - World History since 1500\*\* Credit Hours: (3) MATH 1730 - Pre-Calculus\*\* Credit Hours: (4) or MATH 1830 or MATH 1710 and MATH 1720 in lieu of MATH 1730

#### Note:

If the student does not qualify for MATH 1730, the student must begin math sequence in the fall of the first year. In lieu of MATH 1730, students may elect to take MATH 1710 + MATH 1720.

#### Semester Totals 36 hrs

#### Sophomore Year

ARCH 2212 - History of Architecture 2 Credit Hours: (3)

ARCH 2411 - Building Technology 1 Credit Hours: (3)

ARCH 2611 - Computer Apps in Design 1 Credit Hours: (3)

ARCH 2711 - Design Studio 1 Credit Hours: (5)

PHYS 2010 - General Physics | Credit Hours: (3)

PHYS 2011 - General Physics Lab | Credit Hours: (1)

ARCH 2412 - Building Technology 2 Credit Hours: (3)

ARCH 2612 - Computer Apps in Design 2 Credit Hours: (3)

ARCH 2712 - Design Studio 2 Credit Hours: (5)

COMM 2381 - Oral Communication \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*

#### Semester Totals 35 hrs

#### Junior Year

ARCH 3221 - Determinants of Modern Design Credit Hours: (3) ARCH 3321 - Structural Design 1 Credit Hours: (3)

ARCH 3421 - Environmental Systems Credit Hours: (3)

ARCH 3613 - Computer Apps in Design 3 Credit Hours: (3)

ARCH 3713 - Design Studio 3 Credit Hours: (5)

ARCH 3222 - Contemporary Architecture 1 Credit Hours: (3)

ARCH 3322 - Structural Design 2 Credit Hours: (3)

ARCH 3714 - Design Studio 4 Credit Hours: (5)

ARTH 2010 - World Art I Credit Hours: (3)

Semester Totals 31 hrs

Senior Year

ARCH 4231 - Issues in City Building Credit Hours: (3) ARCH 4441 - Construction Documents Credit Hours: (3) ARCH 4715 - Design Studio 5 Credit Hours: (5) ARTH 2020 - World Art II Credit Hours: (3)

ARCH 4421 - Sustainable Design Credit Hours: (3) or approved upper division (3/4000 level) ARCH Elective ARCH 4716 - Design Studio 6 Credit Hours: (5) ESCI 1010 - Weather and Climate Credit Hours: (4) or ESCI 1020 or ESCI 1040

Semester Totals 26 hrs

## Total Hours: 128

# Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

NOTES: Students may take MATH 1730 or MATH 1830. See Architecture Academic Advisor.

\*\*In addition to PHYS 2010/PHYS 2011, students may take ESCI 1010, ESCI 1020, ESCI 1040 with appropriate lab to satisfy Natural Science requirement.

# Interior Architecture, (B.F.A.)

The Bachelor of Fine Arts with a major in Interior Architecture is a professional degree and is accredited by the Council for Interior Design Accreditation (CIDA).

**NOTE:** All applicants seeking admission to the B.F.A. with a major in Interior Architecture must complete and submit to the Department of Architecture an application form, a writing assignment, and a portfolio of five representative works. These three components comprise the Entrance Evaluation and will be reviewed by a faculty committee. Applicants are accepted on the basis of potential in the field of Interior Design. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any Architecture courses for which a permit is required beyond first semester, first year is based upon this review. Contact the Department of Architecture for details and deadline.

Students transferring from another major or another institution who intend to pursue a B.F.A. degree with a major in Interior Architecture must complete the Department of Architecture Entrance Evaluation. Transfer students seeking advanced standing in the Interior Architecture major should submit a portfolio of work representing previously completed Interior Architecture studio work. The review committee will determine if the portfolio work is equivalent to comparable courses at the University of Memphis. Placement in the major is dependent upon the review. Even if admitted to advanced standing, the student may be required to remedy previous course deficiencies.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note: the following are specified by the department for this program:

## Social/Behavioral Sciences:

ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) and SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

#### Natural Science:

Select two of the following: ESCI 1010 - Weather and Climate Credit Hours: (4)

#### Humanities:

```
ARTH 2010 - World Art I Credit Hours: (3)
and
ARTH 2020 - World Art II Credit Hours: (3)
```

### History:

HIST 1110 - World History to 1500\*\* Credit Hours: (3) and HIST 1120 - World History since 1500\*\* Credit Hours: (3)

#### Mathematics:

MATH 1710 - College Algebra Credit Hours: (3)

The Major (79 hours)

Major Foundations Core (32 hours)

ARCH 1111 - Fundamentals of Design Studio Credit Hours: (3) ARCH 1112 - Architecture Graphics Studio Credit Hours: (3) ARCH 1113 - Design Visualization Credit Hours: (3) ARCH 1120 - Intro to Architecture + Design Credit Hours: (3) ARCH 1211 - History of Architecture 1 Credit Hours: (3) ARCH 2212 - History of Architecture 2 Credit Hours: (3) ARCH 2411 - Building Technology 1 Credit Hours: (3) ARCH 2412 - Building Technology 2 Credit Hours: (3) ARCH 2611 - Computer Apps in Design 1 Credit Hours: (3) ARCH 2711 - Design Studio 1 Credit Hours: (5)

## The Major

## Entrance - Completion of Major Core (30 hours)

Candidacy Review and Portfolio Requirements - A Candidacy Review Portfolio is required of all students intending to major in Interior Architecture. Admission to the University of Memphis and completion of the major core do not guarantee placement in the program. Admission is selective and is based on a portfolio evaluation reflecting professional standards and expectations of the major. A portfolio that includes but is not limited to works from the major core courses is required as part of the application. Guidelines and application forms for admission for the Interior Architecture major are available in the department office. Consultation with a faculty advisor is recommended before or during portfolio preparation. Students may submit portfolios for review no earlier than the semester that Candidacy requirements are being completed.

Transfer students must meet entrance requirements of the major. After review, the department notifies the student of one of the following: (1) acceptance, (2) one semester acceptance on a probationary basis, (3) recommendation to correct the deficiencies and reapply, or (4) denial of admission. Permission to enroll in any 3000-4000 level Architecture course is based upon this review.

# Completion of Major (46 hours)

ARCH 2612 - Computer Apps in Design 2 Credit Hours: (3) ARCH 2712 - Design Studio 2 Credit Hours: (5) ARCH 3213 - Survey of Interiors+Furniture Credit Hours: (3) ARCH 3421 - Environmental Systems Credit Hours: (3) ARCH 3431 - Professional Practice Credit Hours: (3) ARCH 3613 - Computer Apps in Design 3 Credit Hours: (3) ARCH 3713 - Design Studio 3 Credit Hours: (5) ARCH 3714 - Design Studio 4 Credit Hours: (5) ARCH 4421 - Sustainable Design Credit Hours: (3) ARCH 4441 - Construction Documents Credit Hours: (3) ARCH 4715 - Design Studio 5 Credit Hours: (5) ARCH 4716 - Design Studio 6 Credit Hours: (5)

## Electives (1-3 hours)

Architecture upper division (3/4000 level) elective to complete the 79 semester hours of Architecture course work. See advisor for details.

## Typical 4-Year Interior Architecture Sequence

#### Freshman Year

ARCH 1112 - Architecture Graphics Studio Credit Hours: (3) ARCH 1120 - Intro to Architecture + Design Credit Hours: (3) ANTH 1200 - Cultural Anthropology \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) HIST 1110 - World History to 1500\*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

ARCH 1111 - Fundamentals of Design Studio Credit Hours: (3) ARCH 1113 - Design Visualization Credit Hours: (3) ARCH 1211 - History of Architecture 1 Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) HIST 1120 - World History since 1500\*\* Credit Hours: (3) MATH 1710 - College Algebra Credit Hours: (3)

#### Semester Totals 36 hrs

#### Sophomore Year

ARCH 2212 - History of Architecture 2 **Credit Hours:** (3) ARCH 2411 - Building Technology 1 **Credit Hours:** (3) ARCH 2611 - Computer Apps in Design 1 **Credit Hours:** (3) ARCH 2711 - Design Studio 1 **Credit Hours:** (5) COMM 2381 - Oral Communication \*\* **Credit Hours:** (3)

ARCH 2412 - Building Technology 2 Credit Hours: (3) ARCH 2612 - Computer Apps in Design 2 Credit Hours: (3) ARCH 2712 - Design Studio 2 Credit Hours: (5) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*

#### Semester Totals 31 hrs

#### Junior Year

ARCH 3421 - Environmental Systems Credit Hours: (3) ARCH 3613 - Computer Apps in Design 3 Credit Hours: (3) ARCH 3713 - Design Studio 3 Credit Hours: (5) ARTH 2010 - World Art | Credit Hours: (3) ARCH 3213 - Survey of Interiors+Furniture Credit Hours: (3) ARCH 3431 - Professional Practice Credit Hours: (3) ARCH 3714 - Design Studio 4 Credit Hours: (5) ARTH 2020 - World Art II Credit Hours: (3)

#### Semester Totals 28 hrs

#### Senior Year

ARCH 4441 - Construction Documents Credit Hours: (3) ARCH 4715 - Design Studio 5 Credit Hours: (5) ARCH elective\*\*\* (3) Natural Science\*\* (4)

```
ARCH 4421 - Sustainable Design Credit Hours: (3)
ARCH 4716 - Design Studio 6 Credit Hours: (5)
Natural Science** (4)
```

Semester Totals 25-27 hrs

#### Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement.

\*\*Natural \*\*Science (8 Credit hours required): ESCI 1010, ESCI 1020, ESCI 1040 (Must take 2 of these 3)

\*\*\*Elective must be 3000-4000 level with ARCH prefix.

A minimum of 42 upper division hours in the major required.

# **Department of Art**

The Bachelor of Fine Arts with a major in Art is a professional degree offering students the specialized training available in art schools, combined with the benefits of a broad liberal arts education.

Program objectives for the B.F.A. in Art are: (a) to develop a B.F.A. student who is capable of critical and analytical reasoning as a practicing art professional; (b) to provide students with a foundation for graduate or professional education; (c) to prepare students to join the community of artists at the local, national and international levels; (d) to acquire the knowledge to work comprehensively in the discipline or related discipline. The Department of Art welcomes qualified individuals who aspire to become practicing artists and designers. Professional art and design education are available in four concentration options: (1) Art Education; (2) Studio Arts; (3) Graphic Design; (4) Photography.

The Department also welcomes students considering a minor in Art History, Graphic Design, Photography, Studio Art, or in Web Design. Please see the Minors section following the listing of concentration requirements for the B.F.A. in Art.

Special requirements for the Art major are divided into five groups:

General Education

Foundation in Art

Art History

Concentration Area

electives to bring the total credit hours to 120 hours.

Advanced Placement Credit: Prior to registration, Advanced Placement portfolios should be reviewed in the Department of Art for consistency with the performance standards required of enrolled students. An A.P. portfolio with a score of three (3), four (4), or five (5) points on the General Portfolio or on the Drawing Portfolio will be reviewed for the possible award of three credit hours. If a student submits separate portfolios from the junior and senior years, a maximum of six credit hours may be awarded. For a grade of three (3) points on the Drawing Portfolio or three (3), four (4), or five (5) points on the General Portfolio, three hours of unassigned studio elective credit may be awarded. For a grade of four (4) or five (5) points in the Drawing Portfolio, three hours of credit in Art 1311 (Beginning Drawing) will be considered. Unassigned A.P. credit may be used to satisfy a University credit.

747

Advising: Student advising in the Department of Art is an essential support service that aids students in clarifying academic goals consistent with their interests, abilities, and resources. Academic advisors assist Art majors in the selection of appropriate courses and provide meaningful discussion regarding career goals, past academic experience, and future academic progress. Freshmen, transfer and returning students are encouraged to contact the Art Office (room 200, Art and Communication Building) to request an academic advisor. Assistance from an advisor does not relieve a student of the responsibility of studying the appropriate catalog (Catalog) and fulfilling all degree requirements.

Transfer students with more than 40 semester hours should see the CCFA College Advisor (room 232, CFA Building) before seeing an Art advisor.

Before taking courses from another institution intended to apply towards the University of Memphis graduation, the student must obtain permission from the CCFA Dean.

**NOTES for Graphic Design Students:** Transfer students seeking advanced standing in the Graphic Design concentration should submit a portfolio of work representing previously completed Graphic Design studio work. The review committee will determine if the portfolio work is equivalent to comparable courses at the University of Memphis. Placement in the concentration is dependent upon the review. Even if admitted to advanced standing, the student may be required to remedy previous course deficiencies.

# Art - Art Education Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

ARTH 2010 - World Art | Credit Hours: (3) ARTH 2020 - World Art || Credit Hours: (3) ARTH 2030 - Visual Studies/Indigenous Arts Credit Hours: (3)

The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

ART 1210 - Foundations Studio | Credit Hours: (3) ART 1215 - Foundations Studio || Credit Hours: (3) ART 1311 - Drawing | Credit Hours: (3) ART 1314 - Drawing || Credit Hours: (3)

# Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Art Education (67 hours):

## Entrance (12 hours)

Note about Portfolio review: Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed.

ART 2331 - Painting | Credit Hours: (3) ART 2351 - Intro to Printmaking Credit Hours: (3) ART 2511 - Sculpture | Credit Hours: (3) ART 2523 - Ceramics | Credit Hours: (3)

#### Art History (3 hours)

One upper division (3/4000 level) art history course.

UD ARTH elective

#### Completion of Concentration (43 hours)

ART 3411 - Art for Children Credit Hours: (3) ART 3423 - Art Secondary Schools Credit Hours: (3) ART 4321 - Drawing and Painting I Credit Hours: (3) ART 4427 - Method/Materials Art Instruc Credit Hours: (3) ART 4441 - Art Ed Prof Seminar Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) ART 4430 - Community Art Project Credit Hours: (1) ART 4440 - Analysis of Teaching Credit Hours: (4) ART 4914 - Art Education Residency I Credit Hours: (5)

## Art Electives (9 hours)

A studio specialty of three or four courses in the same field is also required; see adviser for details. All required 2000 level art courses must be completed before enrollment in 4000 level studio classes. Art electives complete the 79 semester hours of professional course work.

#### Note:

See the introduction to the College of Communication and Fine Arts requirements at the Teacher Preparation section.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Art Education Concentration Sequence

## Freshman Year

ART 1210 - Foundations Studio I Credit Hours: (3)

ART 1311 - Drawing | Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) Math\* (3) Natural Science\* (4) ART 1215 - Foundations Studio II Credit Hours: (3) ART 1314 - Drawing II Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social/Behavioral Sciences\* (3) Natural Science\* (4)

#### Semester Totals 32 hrs

#### Sophomore Year

ART 2511 - Sculpture I Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) ARTH 2010 - World Art I Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) ART 2523 - Ceramics I Credit Hours: (3) ART 2351 - Intro to Printmaking Credit Hours: (3) ARTH 2020 - World Art II Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

ART 2331 - Painting | Credit Hours: (3)

#### Semester Totals 30 hrs

#### Junior Year

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) ART 3411 - Art for Children Credit Hours: (3) ART elective studio (3) History/American Heritage Social Science (3) ART 4321 - Drawing and Painting I Credit Hours: (3) ART 3423 - Art Secondary Schools Credit Hours: (3) ART 4430 - Community Art Project Credit Hours: (1) Art elective for specialty Art elective studio (3) History/American Heritage (3)

#### Semester Totals 31 hrs

#### Senior Year

UD ARTH elective (3) ART 4914 - Art Education Residency I Credit Hours: (5) ART 4427 - Method/Materials Art Instruc Credit Hours: (3) ART 4440 - Analysis of Teaching Credit Hours: (4) ART 4441 - Art Ed Prof Seminar Credit Hours: (3) ART 4912 - Art Education Residency II Credit Hours: (9) or ICL 4912

## Total Hours: 120

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Art - Graphic Design Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

ARTH 2010 - World Art | Credit Hours: (3) ARTH 2020 - World Art || Credit Hours: (3) ARTH 2030 - Visual Studies/Indigenous Arts Credit Hours: (3)

The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

ART 1210 - Foundations Studio | Credit Hours: (3) ART 1215 - Foundations Studio || Credit Hours: (3) ART 1311 - Drawing | Credit Hours: (3) ART 1314 - Drawing || Credit Hours: (3)

## Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Graphic Design (67 hours):

## Entrance (10 hours)

Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed. Enrollment in 3000 or 4000 level graphic design courses is based upon this review.

ART 2213 - Typographic Design I Credit Hours: (3) ART 2219 - Visual Thinking Credit Hours: (3) ART 2223 - Computer Assisted Graphc Des Credit Hours: (3) ART 3210 - Graphic Des Candidacy Review Credit Hours: (1)

## Art History (9 hours)

ART 4224 - History Graphic Design Credit Hours: (3) 2 upper division art history courses

#### Note:

COMM 4850 may be substituted for one art history course.

## Completion of Concentration (39 hours)

ART 2701 - Photography I Credit Hours: (3)
ART 3213 - Typographic Design II Credit Hours: (3)
ART 3219 - Image Design Credit Hours: (3)
ART 3222 - Graphic Design Method Credit Hours: (3)
ART 3227 - Electronic Pre-Press Prod Credit Hours: (3)
ART 3313 - Drawing And Composition Credit Hours: (3)
ART 3314 - Drawing And Concepts Credit Hours: (3)
ART 4211 - Writing/Design Process Credit Hours: (3)
ART 4220 - Print Communication Design Credit Hours: (3)
ART 4560 - Interactive Media Design Credit Hours: (3)
ART 4223 - Special Studies/Graphic Des Credit Hours: (3-12) (may be taken more than once)
ART 4235 - Graphic Design Protfolio Credit Hours: (3)
ART 4230 - Graphic Design Internship Credit Hours: (3)

## Art Electives (9 hours)

Art electives complete the 79 hours of professional course work.

# Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Graphic Design Concentration Sequence

#### **Freshman Year**

ART 1210 - Foundations Studio | Credit Hours: (3) ART 1311 - Drawing | Credit Hours: (3) ARTH 2010 - World Art | Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3) ART 1215 - Foundations Studio || Credit Hours: (3) ART 1314 - Drawing || Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) ART 2223 - Computer Assisted Graphc Des Credit Hours: (3)

```
ARTH 2020 - World Art II Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

ART 2213 - Typographic Design I Credit Hours: (3) ART 2701 - Photography I Credit Hours: (3) ART 2219 - Visual Thinking Credit Hours: (3) ART 3210 - Graphic Des Candidacy Review Credit Hours: (1) ARTH elective (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* ART 3213 - Typographic Design II Credit Hours: (3)

```
ART 3219 - Image Design Credit Hours: (3)
Natural Sciences* (4)
ART elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
```

#### Semester Totals 32 hrs

#### Junior Year

```
ART elective (3)
ART 3313 - Drawing And Composition Credit Hours: (3) or ART 3314 - Drawing And Concepts
ART 3227 - Electronic Pre-Press Prod Credit Hours: (3)
ARTH elective (3)
Natural Science* (4)
```

```
ART 3222 - Graphic Design Method Credit Hours: (3)
ART 4220 - Print Communication Design Credit Hours: (3)
ART 4224 - History Graphic Design Credit Hours: (3)
Social/Behavioral Sciences* (3)
History (3)
```

#### Semester Totals 31 hrs

#### Senior Year

```
ART 4233 - Design Practice Studio Credit Hours: (3-12)
ART 4560 - Interactive Media Design Credit Hours: (3)
ART 4211 - Writing/Design Process Credit Hours: (3)
History* (3)
ART elective (3)
```

```
Graphic Design Elective
ART 4223 - Special Studies/Graphic Des Credit Hours: (3-12)
ART 4235 - Graphic Design Portfolio Credit Hours: (3)
Social/Behavioral Sciences* (3)
```

Semester Totals 27 hrs

Total Hours: 120

## Hours Required for Graduation: 120

# Art - Photography Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

ARTH 2010 - World Art | Credit Hours: (3) ARTH 2020 - World Art || Credit Hours: (3) ARTH 2030 - Visual Studies/Indigenous Arts Credit Hours: (3)

## The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

ART 1210 - Foundations Studio | **Credit Hours:** (3) ART 1215 - Foundations Studio || **Credit Hours:** (3) ART 1311 - Drawing | **Credit Hours:** (3) ART 1314 - Drawing || **Credit Hours:** (3)

# Concentrations

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration entrance application and a portfolio should be submitted upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus additional concentration-specific courses (see concentration areas for these courses). The portfolio includes, but is not limited to, artwork from these courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Photography (67 hours):

## Entrance (18 hours)

Students may submit portfolios for review no earlier than the semester that the entrance requirements are being completed. Enrollment in 3000 or 4000 level studio courses is based upon this review.

ART 2701 - Photography | Credit Hours: (3) ART 2702 - Photography || Credit Hours: (3) ART 3301 - Digital Art Credit Hours: (3) ART 3701 - Photography ||| Credit Hours: (3) Choose one of these two options: ART 2331 - Painting | Credit Hours: (3) or ART 2351 - Intro to Printmaking Credit Hours: (3) Choose one of these two options: ART 2511 - Sculpture | Credit Hours: (3) or

ART 2523 - Ceramics | Credit Hours: (3)

#### Art History (9 hours)

Choose three classes from the options listed below. ARTH 4155 - High Modern Art Credit Hours: (3) ARTH 4157 - Contemp Art/Theory/Criticism Credit Hours: (3) ARTH 4721 - History Photography I Credit Hours: (3) ARTH 4722 - History Photography II Credit Hours: (3)

#### Completion of Concentration (31 hours)

Required Courses ART 4650 - Profess Art Practices Credit Hours: (3) ART 4711 - Adv Photography Seminar Credit Hours: (1-3) ART 4712 - Photography Portfolio Seminar Credit Hours: (1-3) ART 4990 - Senior Thesis Preparation Credit Hours: (3) ART 4995 - Senior Thesis Exhibition Credit Hours: (3) ART 3000 - Photography Lab Management Credit Hours: (1) Plus five 4000 level courses including but not limited to the following: ART 4701 - Color Photography Credit Hours: (3) ART 4702 - Photographic Material/Process Credit Hours: (3) ART 4703 - Alternative Photogrphc Process Credit Hours: (3) ART 4704 - Photographic Lighting Credit Hours: (3) ART 4705 - Video for Artists Credit Hours: (3) ART 4353 - Computer Image Print/Photo I Credit Hours: (1-3)

#### Art Electives (9 hours)

Art and/or Art history electives complete the 79 semester hours of course work.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

# Typical 4-Year Art Sequence Photography Concentration

#### Freshman Year

First Semester ENGL 1010 - English Composition\*\* Credit Hours: (3) ART 1210 - Foundations Studio | Credit Hours: (3) ART 1311 - Drawing | Credit Hours: (3) ART 2701 - Photography | Credit Hours: (3) \*Social/Behavioral Science Credit Hours: (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) ART 1314 - Drawing II Credit Hours: (3) ART 1215 - Foundations Studio II Credit Hours: (3) ART 2702 - Photography II Credit Hours: (3) \*Social/Behavioral Science Credit Hours: (3)

#### Semester Totals 30 Hours

### Sophomore Year

First Semester ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) ART 3701 - Photography III Credit Hours: (3) ART 3301 - Digital Art Credit Hours: (3) ARTH 2010 - World Art I Credit Hours: (3) or ARTH 2020 or ARTH 2030 \*History Credit Hours: (3)

#### Second Semester

\*MATH Credit Hours: (3) ART 2511 - Sculpture I Credit Hours: (3) or ART 2523 ARTH 2020 - World Art II Credit Hours: (3) or ARTH 2030 \*History Credit Hours: (3) ART 3000 Photography Lab Mgmt Credit Hours: (1) ART 4000 Level Photography Class Credit Hours: (3)

#### Semester Totals 31 Hours

#### Junior Year

**First Semester** ART 2331 - Painting | **Credit Hours:** (3) or ART 2351 ART 4711 - Adv Photography Seminar **Credit Hours:** (1-3) \*Natural Science **Credit Hours:** (4) ARTH Elective **Credit Hours:** (3) ART 4000 Level Photography Class **Credit Hours:** (3)

#### Second Semester

ART 4712 - Photography Portfolio Seminar Credit Hours: (1-3) ART 4000 Level Photography Class Credit Hours: (3) Art Elective Credit Hours: (3) ARTH Elective Credit Hours: (3) \*Natural Science Credit Hours: (4)

#### Semester Totals 32 Hours

#### Senior Year

#### First Semester

COMM 2381 - Oral Communication \*\* Credit Hours: (3) ART 4650 - Profess Art Practices Credit Hours: (3) ART 4990 - Senior Thesis Preparation Credit Hours: (3) ART 4000 Level Photography Class Credit Hours: (3) ARTH Elective Credit Hours: (3)

#### Second Semester

ART 4995 - Senior Thesis Exhibition Credit Hours: (3) ART 4000 Level Photography Class Credit Hours: (3) ART 4000 Level Photography Class Credit Hours: (3) Art Elective Credit Hours: (3)

#### Semester Totals 27 Hours

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Art - Studio Arts Concentration, (B.F.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that the Humanities category is satisfied for art students who meet all B.F.A. in Art requirements by taking two of the following three courses:

ARTH 2010 - World Art | Credit Hours: (3) ARTH 2020 - World Art || Credit Hours: (3) ARTH 2030 - Visual Studies/Indigenous Arts Credit Hours: (3)

The Major (79 hours)

#### Major Core (Foundation in Art) (12 hours)

ART 1210 - Foundations Studio | **Credit Hours:** (3) ART 1215 - Foundations Studio || **Credit Hours:** (3) ART 1311 - Drawing | **Credit Hours:** (3) ART 1314 - Drawing || **Credit Hours:** (3)

# Concentration

Art majors must be formally accepted into a concentration. Admission to the University and completion of foundation art courses do not guarantee placement in a concentration. Admission is selective and is based on a portfolio evaluation that reflects professional standards and meets concentration expectations. Space availability may also affect admission decisions. A concentration portfolio review occurs upon completion of foundation courses (ART 1210, ART 1215, ART 1311, ART 1314) plus three additional entry level courses. Guidelines and application forms for concentration admission are available in the department office and from faculty advisors. Consultation with a faculty adviser is recommended before or during portfolio preparation. Transfer students must meet concentration entrance requirements. After review, the department notifies the student of one of the following: (1) acceptance, (2) recommendation to correct deficiencies and reapply, or (3) denial of admission.

# Studio Arts (67 hours):

The four fields are interdependent and share the following requirements:

## Entry Level Courses (18 hours)

ART 2331 - Painting | Credit Hours: (3) ART 3301 - Digital Art Credit Hours: (3) ART 2351 - Intro to Printmaking Credit Hours: (3) ART 2511 - Sculpture | Credit Hours: (3) ART 2523 - Ceramics | Credit Hours: (3) ART 2701 - Photography | Credit Hours: (3)

#### Art History (6 hours)

ARTH 4155 - High Modern Art Credit Hours: (3) or ARTH 4157 - Contemp Art/Theory/Criticism Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php Plus 3 hours in upper division art history courses

## Required Studio Courses (37 hours)

Required studio courses (16 hrs), plus seven upper level studio courses.

ART 3313 - Drawing And Composition **Credit Hours:** (3) ART 3314 - Drawing And Concepts **Credit Hours:** (3) ART 4650 - Profess Art Practices **Credit Hours:** (3) ART 4990 - Senior Thesis Preparation **Credit Hours:** (3) ART 4995 - Senior Thesis Exhibition **Credit Hours:** (3) ART 4622 - Workshop in Art II **Credit Hours:** (1-3) (1)

#### 7 Upper Level Studio Courses (21 hours) From:

Ceramics:

ART 3522 - Kilns/Glazes/Tech Skill Credit Hours: (3) ART 3524 - Ceramics II Credit Hours: (3) ART 4521 - Ceramics III Credit Hours: (3) ART 4522 - Ceramics IV Credit Hours: (3)

#### Painting:

ART 3332 - Painting II Credit Hours: (3) ART 4169 - Mural Painting as Public Art Credit Hours: (3) ART 4321 - Drawing and Painting I Credit Hours: (3) ART 4322 - Drawing and Painting II Credit Hours: (3) ART 4331 - Painting III Credit Hours: (3) ART 4332 - Painting IV Credit Hours: (3) ART 4333 - Painting V Credit Hours: (3)

Printmaking:

- ART 2352 Intro Intaglio/Lithography Credit Hours: (3) ART 3351 - Intaglio Printmaking Credit Hours: (3)
- ART 3352 Lithography Credit Hours: (3)
- ART 4351 Adv Printmaking | Credit Hours: (3)
- ART 4351 Adv Printmaking I Credit Hours: (3) ART 4352 - Adv Printmaking II Credit Hours: (3)
- ART 4352 Adv Printinaking II Credit Hours: (3)
- ART 4353 Computer Image Print/Photo I Credit Hours: (3)
- ART 4354 Computer Image Print/Photo II Credit Hours: (1-3)

#### Sculpture:

ART 3511 - Sculpture II Credit Hours: (3) ART 3512 - Sculpture III Credit Hours: (3) ART 4511 - Sculpture IV Credit Hours: (3) ART 4512 - Sculpture V Credit Hours: (3)

Independent Studies and Book Arts:

```
ART 4621 - Workshop in Art | Credit Hours: (1-3)
ART 4314 - Art of the Book Credit Hours: (3)
```

757

All 2000 level art courses must be completed before enrollment in 4000 level studio courses.

## Art Electives (6 hours)

Art electives complete the 79 semester hours of professional course work.

## Graduation

For the B.F.A. in Art, a total of 120 semester hours is required, 85 of which must be in professional course work that includes two courses from among ARTH 2010, 2020 or 2030. A minimum of 42 upper division semester hours is required for the degree. A minimum 2.0 GPA is required for the major and all required courses for the Art major must have a minimum grade of "C-."

## Typical 4-Year Studio Arts Concentration Sequence

## Freshman Year

```
ART 1210 - Foundations Studio | Credit Hours: (3)
ART 1311 - Drawing | Credit Hours: (3)
ARTH 2010 - World Art | Credit Hours: (3)
ENGL 1010 - English Composition** Credit Hours: (3)
MATH* (3)
```

ART 1215 - Foundations Studio II Credit Hours: (3) ART 1314 - Drawing II Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) ART 2701 - Photography I Credit Hours: (3) ARTH 2020 - World Art II Credit Hours: (3)

### Semester Totals 30 hrs

### Sophomore Year

ART 2331 - Painting | Credit Hours: (3) ART 3301 - Digital Art Credit Hours: (3) ART 2511 - Sculpture | Credit Hours: (3) ARTH 4155 - High Modern Art Credit Hours: (3) or ARTH 4157 - Contemp Art/Theory/Criticism ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* COMM 2381 - Oral Communication \*\* Credit Hours: (3)

ART 3313 - Drawing And Composition Credit Hours: (3) ART 2351 - Intro to Printmaking Credit Hours: (3) ART 2523 - Ceramics I Credit Hours: (3) ARTH elective (3) Natural Science\* (4)

### Semester Totals 34 hrs

### Submit portfolio for Concentration Entrance

## Junior Year

```
ART 3314 - Drawing And Concepts Credit Hours: (3)
ART (Upper level studio course-1) (3)
ART (Upper level studio course-2) (3)
The online catalog can be accessed at: http://catalog.memphis.edu/index.php
```

ART (Upper level studio course-3) (3) Natural Science (4)

ART (Upper level studio course-4) (3) ART (Upper level studio course-5) (3) ART (Upper level studio course-6) (3) Social/Behavioral Sciences\* (3) History\* (3)

### Semester Totals 31 hrs

### Senior Year

ART (Upper level studio course-7) (3) ART 4650 - Profess Art Practices Credit Hours: (3) ART 4990 - Senior Thesis Preparation Credit Hours: (3) ART 4622 - Workshop in Art II Credit Hours: (1-3) History\* (3)

ART 4995 - Senior Thesis Exhibition Credit Hours: (3) ART or ARTH elective (3) ART or ARTH elective (3) Social/Behavioral Sciences\* (3)

Semester Totals 25 hrs

Total Hours: 120

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Art History - African Diaspora Arts and Visual Culture Concentration, (B.A.)

## Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2030 - Visual Studies/Indigenous Arts and either ARTH 2010 - World Art I or ARTH 2020 - World Art II

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (42 hours)

Completion of 36 hours in art history courses including:

a minimum of 6 hours of studio art. These courses can be taken from the studio concentration under Art-Studio Arts Concentration, (B.F.A).

760

# African Diaspora Arts and Visual Culture

African Diaspora Arts and Visual Culture is an interdisciplinary area of concentration within the B.A. in Art History. Its mission is to introduce students to the theoretical frameworks and methodologies for approaching the study of the diverse arts and visual cultures of peoples of African descent. Art and visual culture are examined in relation to the broader African diaspora, whereby students acquire analytical skills that enhance their understanding of historical and contemporary issues from a global perspective. Students supplement the Art History curriculum with courses drawn from a variety of disciplines. The program objectives for the concentration in African Diaspora Arts and Visual Culture emphasize research employing original sources, the ability to think and read critically, the skill of writing meaningfully, and the application of acquired knowledge in the context of cultural institutions such as museums, galleries, and historical sites.

## Within the Requirements for the Major in Art History

Within the requirements for the major in Art History, students in this concentration need to complete:

ARTH 4185 - African American Art Credit Hours: (3)

### Plus Two Courses from Museum Studies selected from:

ARTH 4381 - Art Curatorial Techniques Credit Hours: (3) ARTH 4386 - Introduction to Museums Credit Hours: (3) ARTH 4660 - Museum Collections Credit Hours: (3) ARTH 4662 - Museum Exhibitions Credit Hours: (3)

## Plus an additional 9 hours from ARTH 4000-level series

## Electives (18-19 hours)

For the concentration in African Diaspora Arts and Visual Culture, students also need to take two courses outside the Department of Art selected from the following:

ENGL 3325 - Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3) ENGL 3326 - Af/Am Lit since Harlem Ren \*\* Credit Hours: (3) ENGL 4373 - Af/Am Author since Harlem Ren \*\* Credit Hours: (3) HIST 4222 - Race/Class in Latin America Credit Hours: (3) HIST 4288 - West Africa/Diaspora \*\* Credit Hours: (3) HIST 4879 - Africa to the Americas Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3)

## Typical 4-Year Art History Sequence

## **Freshmen Year**

ARTH 2010 - World Art | Credit Hours: (3) or ARTH 2030 - Visual Studies/Indigenous Arts ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities/Fine Arts (3)\* Foreign Language/BA (or elective) (3)\*\* Elective (3)

ARTH 2020 - World Art II **Credit Hours:** (3) or ARTH 2010 - World Art I ENGL 1020 - English Comp/Analysis\*\* **Credit Hours:** (3) Humanities/Fine Arts (3) Foreign Language/B.A. (or elective) (3)\*\* Studio Elective (3)

### Semester Totals 30 hours

### Sophomore Year

ARTH elective (3) ARTH elective (3) Foreign Language/B.A. (3) Math (3)\* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*

COMM 2381 - Oral Communication \*\* Credit Hours: (3) ARTH elective (3) ARTH elective (3) Foreign Language/B.A. (3) Elective (3) History (3)\*

### Semester Totals 33 hrs

### Junior Year

ARTH elective (3) Elective (3) Social/Behavior Sciences (3)\* Natural Science (4)\*

ARTH elective (3) ARTH elective (3) Social/Behavior Sciences (3)\* Natural Science (4)\*

### Semester Totals 26 hours

### Senior Year

ARTH elective (3) ARTH elective (3) UD Elective (3) Studio Elective (3) History (3)\*

ARTH 4195 - Proseminar Art History Elective (3) UD Elective (3) UD Elective (3) UD Elective (3) Elective (1)

### Semester Totals 31 hours

Total Hours: 120-121

## Total Hours required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*\*If student chooses ARTH 2030, then must also take an additional General Education Humanities/Fine Arts course instead of an elective.

# Art History - Ancient Egyptian Art and Culture Concentration, (B.A.)

# Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2010 - World Art I and ARTH 2030 - Visual Studies/Indigenous Arts.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (42 hours)

Completion of 36 hours in art history courses, including:

ARTH 4195 - Proseminar Art History

A minimum of 6 hours of studio art. These courses can be taken from the studio courses listed under Art-Studio Arts Concentration, (B.F.A.)

# Ancient Egyptian Art and Culture

The study of Ancient Egyptian art is by its very nature interdisciplinary, combining elements of visual analysis and art historical methods with textual evidence and archaeological and epigraphic fieldwork. This concentration will introduce students, at the undergraduate level, to various aspects of ancient Egyptian culture, focusing primarily on its art and its language and literature. The Egyptian objects currently in the collection of the Institute of Egyptian Art & Archaeology, both on display and in storage, provide an invaluable asset to this program and will greatly enhance the students' learning experience.

## Within the Requirements for the Major in Art History

Within the requirements for the major in Art History, students in this concentration need to complete:

ARTH 2010 - World Art I Credit Hours: (3) ARTH 2030 - Visual Studies/Indigenous Arts Credit Hours: (3) ARTH 4112 - Egypt Art-Old Kingdom Credit Hours: (3) ARTH 4113 - Egypt Art-New Kingdom Credit Hours: (3)

Plus two courses of

Two semesters of Middle Egyptian (arranged as ARTH 4197) must be taken during the student's final year of study and do not meet the Foreign Language requirement for the B.A. Students in this concentration are encouraged to take either French or German to meet their Foreign Language requirement.

763

ARTH 4197 - Adv Indiv Research/ARTH Credit Hours: (3) (two semesters of Middle Egyptian I and II)

#### Plus two courses selected from

ARTH 4119 - Late Antique/Islamic Art/Egypt Credit Hours: (3) ARTH 4121 - Ancient Art Near East Credit Hours: (3) ARTH 4123 - Greek Art Credit Hours: (3) ARTH 4124 - Roman Art Credit Hours: (3) ARTH 4125 - Art/Archaeology Pompeii Credit Hours: (3) ARTH 4183 - Visual Arts of Africa Credit Hours: (3)

#### Plus an additional 9 hours ARTH 4000-level series

## Electives (18-19 hours)

Students in this concentration need to take two courses outside of the Department of Art, including:

HIST 4323 - Egypt of the Pharaohs \*\* Credit Hours: (3)

Plus one of the following: ANTH 3300 - Ancient Civilizations Credit Hours: (3) ANTH 4352 - Archaeology/World Prehistory Credit Hours: (3) HIST 3320 - Ancient World \*\* Credit Hours: (3) HIST 4320 - Ancient Near East Credit Hours: (3) HIST 4321 - Greek Experience \*\* Credit Hours: (3) HIST 4322 - The Roman World Credit Hours: (3)

## Typical 4-Year Art History Sequence

### **Freshman Year**

ARTH 2010 - World Art I Credit Hours: (3) \*\*\* or ARTH 2030 - Visual Studies/Indigenous Arts\*\*\* ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities (3) \* Foreign Language/B.A. (or elective) (3) \*\* Elective (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Fine Arts (3) \* Foreign Language/B.A. (or elective) (3) \*\* Studio elective (3) ARTH 2010 - Survey of Art History I\*\* or ARTH 2030 - Visual Studies/Indigenous Arts

### Semester Totals 30 hrs

### Sophomore Year

ARTH elective (3) ARTH elective (3) Foreign Language/B.A. (3) MATH (3) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3) ARTH elective (3) ARTH elective (3) Foreign Language/B.A. (3) Elective (3) History (3) \*

### Semester Totals 33 hrs

### Junior Year

ARTH elective (3) Elective (3) Social/Behavioral Sciences (3) \* Natural Science (4) \*

ARTH elective (3) ARTH elective (3) Social/Behavioral Sciences (3) \* Natural Science (4) \*

### Semester Totals 26 hrs

### Senior Year

ARTH Elective (3) UD Elective (3) UD Elective (3) Studio Elective (3) History (3)

ARTH 4195 - Proseminar Art History UD Elective (3) UD Elective (3) Elective (3) Elective (1)

### Semester Totals 31 hrs

## Total Hours: 120-121

### Total Hours required for Graduation: 120

\* Must satisfy University General Education Program Requirements.

\*\*\* If student chooses ARTH 2030, then must also take an additional General Education Humanities/Fine Arts course instead of an elective.

# Art History - European Tradition in Art Concentration, (B.A.)

## Art History Major (B.A.)

Program objectives for a B.A. in Art History are: (a) to understand the scope of art in human culture; (b) to acquire the ability to write about art clearly and meaningfully; (c) to acquire knowledge of diverse visual cultures; (d) to acquire the ability to read, write and understand the major terms and concepts of art history; (e) to conduct original research in the discipline.

765

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking ARTH 2010 - World Art I and ARTH 2020 - World Art II.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (42 hours)

Completion of 36 semester hours in art history, including:

ARTH 4195 - Proseminar Art History

A minimum of 6 hours of studio art is also required. These courses can be taken from the studio courses listed under Art-Studio Arts Concentration, (B.F.A.).

## European Tradition in Art

The European tradition is an area of concentration within the B.A. in Art History, whose mission is to introduce students to the visual cultures of the Western world, from antiquity to the modern (and postmodern) age. The concentration offers coursework covering the diverse visual traditions and the variety of historical periods associated with Europe and the Americas. The concentration emphasizes that its students acquire the ability to read, write and understand the major concepts of art history and to conduct original research in the discipline.

## Within the Requirements for the Major in Art History,

Within the requirements for the major in Art History, students in this concentration need to complete:

```
ARTH 2010 - World Art | Credit Hours: (3)
ARTH 2020 - World Art || Credit Hours: (3)
```

One course each from five of the following Art Historical Categories

### Classical

ARTH 4123 - Greek Art Credit Hours: (3) ARTH 4124 - Roman Art Credit Hours: (3) ARTH 4125 - Art/Archaeology Pompeii Credit Hours: (3)

### Medieval

ARTH 4129 - Ancient/Medieval Architecture Credit Hours: (3) ARTH 4130 - Art/Medieval World Credit Hours: (3) ARTH 4131 - Art/Early Middle Ages Credit Hours: (3) ARTH 4134 - Art/High Middle Ages Credit Hours: (3)

### Renaissance-Baroque

ARTH 4141 - Early Renaissance Italy Credit Hours: (3) ARTH 4142 - North Renaissance Art Credit Hours: (3) ARTH 4143 - High Renaissance Italy Credit Hours: (3) ARTH 4146 - Baroque Art Credit Hours: (3)

#### Modern European

ARTH 4148 - Neo-Class/Romanticism **Credit Hours:** (3) ARTH 4149 - Realism & Impressionism **Credit Hours:** (3) ARTH 4152 - Early Modern Art **Credit Hours:** (3) ARTH 4153 - Cubism through Surrealism **Credit Hours:** (3) ARTH 4721 - History Photography I **Credit Hours:** (3)

#### American

ARTH 4158 - Modern Architecture **Credit Hours:** (3) ARTH 4166 - American Art: 1500s-1940s **Credit Hours:** (3) ARTH 4185 - African American Art **Credit Hours:** (3) ARTH 4722 - History Photography II **Credit Hours:** (3)

#### Contemporary

ARTH 4155 - High Modern Art Credit Hours: (3) ARTH 4157 - Contemp Art/Theory/Criticism Credit Hours: (3)

#### An additional 9 hours ARTH 4000-level series

A maximum of two courses from the Museum Studies sequence (ARTH 4381, ARTH 4386, ANTH 4660, or ANTH 4662) may be selected when meeting the remaining 9 hours ARTH 4000-level series.

## Typical 4-Year Art History Sequence

### **Freshmen Year**

ARTH 2010 - World Art I Credit Hours: (3) or ARTH 2020 - World Art II ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities (3)\* Foreign Lanuguage/BA (or elective) (3)\*\* Elective (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Fine Arts (3)\* Foreign Lanuguage/BA (or elective) (3)\*\* Studio Elective (3) ARTH 2010 - World Art I or ARTH 2020 - World Art II Credit Hours: (3)

#### Semester Totals 30 hrs

### Sophomore Year

ARTH elective (3) ARTH elective (3) Foreign Language/BA (3) Math (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) ARTH elective (3) ARTH elective (3) Foreign Language/BA (3) Elective (3) History (3)\*

### Semester Totals 33 hrs

### Junior Year

ARTH elective (3) Elective (3) Social/Behavioral Sciences (3) \* Natural Science (4) \*

ARTH elective (3) ARTH elective (3) Social/Behavioral Sciences (3) \* Natural Science (4) \*

### Semester Totals 26 hrs

### Senior Year

ARTH Elective (3) UD Elective (3) UD Elective (3) Studio Elective (3) History (3)

ARTH 4195 - Proseminar Art History UD Elective (3) UD Elective (3) Elective (3) Elective (1)

### Semester Totals 31 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Art History Minor**

## Requirements

ARTH 2010 - World Art I **Credit Hours:** (3) ARTH 2020 - World Art II **Credit Hours:** (3) ARTH 2030 - Visual Studies/Indigenous Arts **Credit Hours:** (3) 12 semester hours from the ARTH 4000-level courses.

## **Graphic Design Minor**

### Requirements

Completion of 18 semester hours as follows:

ART 2223 - Computer Assisted Graphc Des Credit Hours: (3) ART 2213 - Typographic Design | Credit Hours: (3)

ART 2219 - Visual Thinking Credit Hours: (3)

ART 3213 - Typographic Design II Credit Hours: (3)

ART 3219 - Image Design Credit Hours: (3)

ART 4224 - History Graphic Design Credit Hours: (3)

## **Photography Minor**

### **Requirements:**

Completion of 18 semester hours as follows:

ART 2701 - Photography | Credit Hours: (3) ART 2702 - Photography || Credit Hours: (3) ART 3701 - Photography ||| Credit Hours: (3)

### Select two of the following:

ART 4526 - Advanced Photojournalism Credit Hours: (3) ART 4701 - Color Photography Credit Hours: (3) ART 4702 - Photographic Material/Process Credit Hours: (3) ART 4703 - Alternative Photogrphc Process Credit Hours: (3) ART 4704 - Photographic Lighting Credit Hours: (3) ART 4705 - Video for Artists Credit Hours: (3)

### Select one of the following:

ARTH 4721 - History Photography | Credit Hours: (3) ARTH 4722 - History Photography || Credit Hours: (3)

## **Studio Arts Minor**

### **Requirements:**

Completion of 18 semester hours as follows:

ART 1311 - Drawing | Credit Hours: (3) ART 1314 - Drawing || Credit Hours: (3)

## Choose one of the following tracks:

#### 769

#### Ceramics:

ART 2523 - Ceramics I Credit Hours: (3) ART 3522 - Kilns/Glazes/Tech Skill Credit Hours: (3) ART 3524 - Ceramics II Credit Hours: (3) ART 4521 - Ceramics III Credit Hours: (3)

### Painting:

ART 2331 - Painting | Credit Hours: (3) ART 3332 - Painting || Credit Hours: (3) ART 4321 - Drawing and Painting | Credit Hours: (3) ART 4331 - Painting ||| Credit Hours: (3)

### Printmaking:

ART 2352 - Intro Intaglio/Lithography Credit Hours: (3) ART 3351 - Intaglio Printmaking Credit Hours: (3) ART 3352 - Lithography Credit Hours: (3) ART 4351 - Adv Printmaking | Credit Hours: (3)

### Sculpture:

ART 2511 - Sculpture I Credit Hours: (3) ART 3511 - Sculpture II Credit Hours: (3) ART 3512 - Sculpture III Credit Hours: (3) ART 4511 - Sculpture IV Credit Hours: (3)

# Web Design Minor

## Requirements

Completion of 18 semester hours as follows:

ART 2223 - Computer Assisted Graphc Des Credit Hours: (3) ART 2213 - Typographic Design I Credit Hours: (3) ART 2219 - Visual Thinking Credit Hours: (3) ART 4500 - Web Publishing I: html/CSS Credit Hours: ART 4560 - Interactive Media Design Credit Hours: (3) ART 4224 - History Graphic Design Credit Hours: (3)

# **Department of Communication and Film**

The program objectives for a B.A. in Communication are linked to five key areas:

Performance: Students will demonstrate competence in producing messages for different purposes, audiences, and contexts.

Analysis and Critical Thinking: Students will analyze, interpret and evaluate messages across various forms and contexts.

**Knowledge**: Students will know the development of communication studies from its rhetorical roots through social scientific perspectives to contemporary critical approaches.

Ethics: Students will articulate ethical principles and apply them in diverse communication contexts.

Mediated Communication: Students will understand the impact of media forms on communication processes.

## **Communication, Communication Studies Concentration (B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (33-37 hours)

### Major Core (6 hours)

#### All students must take

COMM 2100 - Communication Inquiry \*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) (included in the University General Education Program)

#### Note

A 2.0 cumulative GPA and a grade no lower than a C- is required for all courses completed in the major. In addition, all students must fulfill the requirements for one of the following concentrations:

### Communication Studies (31 hours):

COMM 2101 - Media and Info Literacy \*\* Credit Hours: (3) COMM 3001 - Rhetoric/Civic Controversy \*\* Credit Hours: (3) COMM 3100 - Communication Ethics \*\* Credit Hours: (3) COMM 3330 - Communication Research Methods \*\* Credit Hours: (4) COMM 4381 - Senior Capstone \*\* Credit Hours: (3)

#### Plus Three Courses From One of the Following Focus Areas:

#### Professional & Relational Communication

COMM 3012 - Health Communication \*\* Credit Hours: (3) COMM 3322 - Theories of Persuasion \*\* Credit Hours: (3) COMM 3341 - Discussion Credit Hours: (3) COMM 3561 - Gender in Communication Credit Hours: (3) COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4014 - Communication on the Internet \*\* Credit Hours: (3) COMM 4015 - Health Literacy Credit Hours: (3) COMM 4016 - Public Health Campaigns Credit Hours: (3) COMM 4340 - Listening Credit Hours: (3) COMM 4341 - Interpersonal Communication \*\* Credit Hours: (3) COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4363 - Dialogue Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) COMM 4380 - Communication and Conflict \*\* Credit Hours: (3) COMM 4400 - Contemplative Communication Credit Hours: (3)

#### Rhetoric & Public Advocacy

COMM 3321 - Argumentation and Advocacy \*\* Credit Hours: (3) COMM 3322 - Theories of Persuasion \*\* Credit Hours: (3) COMM 3341 - Discussion Credit Hours: (3) COMM 3561 - Gender in Communication Credit Hours: (3) COMM 3360 - Rhetoric of Pop Culture Credit Hours: (3) COMM 3361 - African-American Rhetoric \*\* Credit Hours: (3) COMM 4013 - Political Communication Credit Hours: (3) COMM 4013 - Political Communication Credit Hours: (3) COMM 4340 - Listening Credit Hours: (3) COMM 4360 - American Eloquence Credit Hours: (3) COMM 4364 - Gendered Public Discourse Credit Hours: (3) COMM 4365 - Place/Community/Communication Credit Hours: (3) COMM 4380 - Communication and Conflict \*\* Credit Hours: (3) COMM 4400 - Contemplative Communication Credit Hours: (3)

#### Media & Culture

COMM 1851 - Introduction to Film** Credit Hours: (3)
COMM 3003 - Television and Culture** Credit Hours: (3)
COMM 3322 - Theories of Persuasion ** Credit Hours: (3)
COMM 3360 - Rhetoric of Pop Culture Credit Hours: (3)
COMM 3800 - Media Industries Credit Hours: (3)
COMM 3820 - Broadcast Prep and Performance Credit Hours: (3)
COMM 3821 - Audio Narratives Credit Hours: (3)
COMM 4014 - Communication on the Internet ** Credit Hours: (3)
COMM 4811 - Media 2.0 Credit Hours: (3)
COMM 4850 - Film History   Credit Hours: (3)
COMM 4851 - Film History II Credit Hours: (3)
COMM 4853 - Documentary Form Film Credit Hours: (3)
COMM 4854 - Documentary Form Broadcasting Credit Hours: (3)
COMM 4856 - Gender and Film Credit Hours: (3)
COMM 4858 - Contemporary Cinema Credit Hours: (3)
COMM 4859 - Monster Films Credit Hours: (3)
COMM 4860 - Reality TV ** Credit Hours: (3)
COMM 4861 - Science Fiction Film Credit Hours: (3)

### Plus 6 Additional Hours of Comm Electives

## Electives (12 - 20 hours)

Completion of courses to bring the total to 120 semester hours.

## Honors Program

To be eligible for admission to the Communication Honors program a student must meet the following requirements: (1) declare a major in Communication, (2) have completed 12 hours of Communication coursework, (3) have Department of Communication faculty member as an adviser, and (4) make an honors application to the adviser. Applications may be obtained from the director of the honors program or from the department office.

To be awarded departmental honors at graduation with the designation "With Honors in Communication," a student must fulfill the following requirements: (1) maintain a 3.5 GPA in communication coursework, (2) maintain a 3.5 GPA overall, (3) complete all Department of Communication major requirements, (4) complete an independent thesis or an independent film/video project sponsored by a Department of Communication faculty member consisting of six hours over two semesters: three hours in research preparation (COMM 3330, COMM 4381, or COMM 4891), and three hours in completing the thesis project (COMM 4999), and (5) successful defense of the thesis.

772

## Typical 4-Year Communication Studies Concentration Sequence

## Freshman Year

COMM 2100 - Communication Inquiry \*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) Math\* (3-4) Foreign Language/B.A. (or elective)\*\* (3) Social/Behavioral Science (3)\*

COMM 2101 - Media and Info Literacy \*\* Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Humanities/Fine Arts\* (3) Foreign Language/B.A. (or elective)\*\* (3) Social/Behavioral Science (3)\*

### Semester Totals 30-31 hrs

### Sophomore Year

```
COMM 2381 - Oral Communication ** Credit Hours: (3)
ENGL 2201 - Literary Heritage ** Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American **
Foreign Language/B.A. (3)
Natural Science (4)*
History* (3)
```

COMM 3001 - Rhetoric/Civic Controversy \*\* Credit Hours: (3) COMM 1851 - Introduction to Film\*\* Credit Hours: (3) Foreign Language/B.A. (3) Natural Science (4)\* History\* (3)

### Semester Totals 32 hrs

### Junior Year

```
COMM 3100 - Communication Ethics ** Credit Hours: (3)
COMM Focus Area Course 1 (3)
COMM elective (3)
UD elective (3)
Elective (3)
```

```
COMM 3330 - Communication Research Methods ** Credit Hours: (4)
COMM Focus Area Course 2 (3)
UD Elective (3)
Elective (3)
```

### Semester Totals 31 hrs

## Senior Year

COMM Focus Area Course 3 (3) UD COMM Elective (3) UD Elective (3) UD Elective (3) Elective (3)

COMM 4381 - Senior Capstone \*\* Credit Hours: (3) UD COMM Elective (3) Elective (3) Elective (3)

Semester Totals 27 hrs

Total Hours: 120-121

## Total Hours Required for Graduation: 120

\* Must satisfy University General Education Program Requirement

# Film and Video Production, Communication (B.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## The Major (33-37 hours)

## Major Core (6 hours)

All students must take

COMM 2100 - Communication Inquiry \*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) (included in the University General Education Program)

### Note

A 2.0 cumulative GPA and a grade no lower than a C- is required for all courses completed in the major. In addition, all students must fulfill the requirements for one of the following concentrations:

## Film and Video Production (27-29 hours):

COMM 3823 - Motion Picture Prod I Credit Hours: (4)

COMM 3824 - Motion Picture Prod II Credit Hours: (4) COMM 3842 - TV Studio Production I Credit Hours: (4)

#### Three Production or Writing courses:

COMM 4822 - Audio Production Film/Video Credit Hours: (3) COMM 4824 - Cinematography Credit Hours: (3) COMM 4825 - Editing/Post Production Credit Hours: (3) COMM 4841 - Television Workshop Credit Hours: (3) COMM 4842 - TV Studio Production II Credit Hours: (4) COMM 4960 - Documentary Writing Credit Hours: (3) COMM 4970 - Screenwriting Credit Hours: (3)

### Two Film Studies courses

```
COMM 3003 - Television and Culture** Credit Hours: (3)
COMM 4220-4229 - Special Topics in Film Credit Hours: (1-3)
COMM 4850 - Film History I Credit Hours: (3)
COMM 4851 - Film History II Credit Hours: (3)
COMM 4853 - Documentary Form Film Credit Hours: (3)
COMM 4854 - Documentary Form Broadcasting Credit Hours: (3)
COMM 4856 - Gender and Film Credit Hours: (3)
COMM 4858 - Contemporary Cinema Credit Hours: (3)
COMM 4859 - Monster Films Credit Hours: (3)
COMM 4860 - Reality TV ** Credit Hours: (3)
COMM 4861 - Science Fiction Film Credit Hours: (3)
```

## Electives (12 - 20 hours)

Completion of courses to bring the total to 120 semester hours.

## Honors Program

To be eligible for admission to the Communication Honors program a student must meet the following requirements: (1) declare a major in Communication, (2) have completed 12 hours of Communication coursework, (3) have Department of Communication faculty member as an adviser, and (4) make an honors application to the adviser. Applications may be obtained from the director of the honors program or from the department office.

To be awarded departmental honors at graduation with the designation "With Honors in Communication," a student must fulfill the following requirements: (1) maintain a 3.5 GPA in communication coursework, (2) maintain a 3.5 GPA overall, (3) complete all Department of Communication major requirements, (4) complete an independent thesis or an independent film/video project sponsored by a Department of Communication faculty member consisting of six hours over two semesters: three hours in research preparation (COMM 3330, COMM 4381, or COMM 4891), and three hours in completing the thesis project (COMM 4999), and (5) successful defense of the thesis.

## Typical 4-Year Film and Video Production Concentration Sequence

### Freshman Year

COMM 1851 - Introduction to Film\*\* Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3) Math (3) Foreign Language/B.A. (or elective)\*\* (3) Natural Science (4)\*

COMM 2100 - Communication Inquiry \*\* Credit Hours: (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social/Behavioral Science\* (3) Foreign Language/B.A. (or elective)\*\* (3) Natural Science (4)\*

#### Semester Totals 32-33 hrs

### Sophomore Year

COMM 3823 - Motion Picture Prod | Credit Hours: (4) Foreign Language/B.A. (3) Social/Behavioral Science (3)\* History\* (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* COMM 3824 - Motion Picture Prod II Credit Hours: (4) COMM Film Studies Course (3) Foreign Language/B.A. (3) Humanities (3)\* History\* (3)

### Semester Totals 32 hrs

### Junior Year

```
COMM 2381 - Oral Communication ** Credit Hours: (3)
COMM 3842 - TV Studio Production I Credit Hours: (4)
Elective (3)
UD elective (3)
UD elective (3)
```

COMM Production/Writing Course (3) COMM Film Studies Course (3) UD elective (3) UD elective (3) Elective (3)

### Semester Totals 31 hrs

### Senior Year

COMM Production/Writing Course (3) UD COMM elective (3) UD Elective (3) Elective (3)

COMM Production/Writing Course (3) UD COMM elective (3) Elective (3) Elective (3)

### Semester Totals 25 hrs

## Total Hours: 120-121

## Total Hours Required for Graduation: 120

\* Must satisfy University General Education Program Requirement

## **Communication Minor**

### Requirements

Any student wishing to minor in any area in the Department of Communication should see the department chair who will assign an appropriate advisor. The minor must consist of at least 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor with the approval of the department chair.

## Communication, Accelerated B.A./M.A.

#### Accelerated B.A./M.A Program in Communication

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Communication during their senior year. Students must begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Communication.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students should have a minimum 3.25 grade point average, and must submit a copy of their transcript and two reference letters from Department of Communication faculty to the Department chair. Each applicant will complete an interview with the undergraduate and graduate studies coordinator.

Students must also apply to the Graduate School for "combination senior" status, which allows them to take graduate courses in Communication. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Communication department's M.A. program.

Up to 9 hours of graduate course work may be applied to both the undergraduate and graduate programs.

# **Department of Journalism and Strategic Media**

The Department of Journalism and Strategic Media at the University of Memphis offers preparation for careers in advertising, broadcast news, multimedia journalism, public relations, sports journalism and visual and creative media. Students are required to take career-oriented skills courses to enhance skills in writing, multimedia, media literacy, professionalism, and critical thinking as they relate to careers in the media. The undergraduate programs of the Department of Journalism and Strategic Media are fully accredited by the Accrediting Council For Education in Journalism and Mass Communications. The public relations major is certified by the Public Relations Society of America.

Program objectives for a B.A. in Advertising, Journalism, or Public Relations are for students to:

- Understand and apply the principles and laws of freedom of speech and press for the country in which the institution that invites ACEJMC is located, as well as receive instruction in and understand the range of systems of freedom of expression around the world, including the right to dissent, to monitor and criticize power, and to assemble and petition for redress of grievances;
- Demonstrate an understanding of the history and role of professionals and institutions in shaping communications;
- Demonstrate an understanding of gender, race, ethnicity, sexual orientation and, as appropriate, other forms of diversity in domestic society in
  - relation to mass communications.
- Demonstrate an understanding of the diversity of peoples and cultures and of the significance and impact of mass communications in a global society;
- Understand concepts and apply theories in the use and presentation of images and information;

Demonstrate an understanding of professional ethical principles and work ethically in pursuit of truth, accuracy, fairness and diversity; Think critically, creatively and independently;

Conduct research and evaluate information by methods appropriate to the communications professions in which they work;

Write correctly and clearly in forms and styles appropriate for the communications professions, audiences and purposes they serve; Critically evaluate their own work and that of others for accuracy and fairness, clarity, appropriate style and grammatical correctness; Apply basic numerical and statistical concepts;

Apply current tools and technologies appropriate for the communications professions in which they work, and to understand the digital world. No matter which program of study is selected, students must have a strong background in liberal arts and an understanding of the social sciences to augment their professional skills. Consequently, students must earn 72 hours of courses from outside the Department of Journalism and Strategic Media in the 120 hours required for graduation and must follow the guidelines provided by the university to qualify for a Bachelor of Arts degree.

All students in Journalism and Strategic Media complete a first-year core of JRSM 1700, JRSM 1750, and JRSM 2121, as these courses are prerequisites for many advanced courses in the individual programs of study. The first-year core must be completed within the first calendar year in the program.

Prerequisite courses must be completed with a minimum grade of "C-" before moving on to any course in the program to which the prerequisites are applied; students must earn a minimum grade of "C" in JRSM 2121 to move on. Majors and minors who fail to earn the minimum passing grade ("C-" or "C" in JRSM 2121) in a class required by their program of study in Journalism and Strategic Media more than three times will be dropped from the program.

A grade point average of 2.0 is required to declare and maintain a major in the Department of Journalism and Strategic Media. Additionally, students must have a 2.0 grade point average in journalism and strategic media classes to graduate.

Students who fail to comply with the above criteria may be permanently dropped from the program.

On-campus practical experience is available through The Daily Helmsman newspaper, WUMR campus radio station, Tiger News campus TV newscast and the Meeman 901 Strategies strategic media firm, as well as through publicity and communications offices throughout campus. All students in Journalism and Strategic Media are required to have a credit-earning work experience.

All undergraduate students are required to develop and maintain an active portfolio of their work. Students are to begin the portfolio in JRSM 3900 or JRSM 3950 and contribute to it during every skills course thereafter. The portfolio should contain samples of the student's work from their courses and/or professional experience and should develop as the student builds skills. Portfolios will undergo a final review while students are enrolled in the capstone course for their program of study.

Students are recommended to have a minor; each program of study has recommended minors.

#### Areas of Study

#### Advertising

The Bachelor of Arts in Advertising trains students for careers in advertising in agency, corporate, nonprofit and freelance settings. Advertising graduates typically work as account executives, account planners, art directors, brand managers, copy writers, creative directors, media buyers, media planners, researchers and social media managers. Advertising students take 48 hours of credit from Journalism and Strategic Media and 9 hours in Marketing.

#### **Creative Mass Media**

The Bachelor of Arts in Journalism, concentration in Creative Mass Media, trains students to be a well-rounded creative media professional. Creative mass media concentration graduates typically work as art directors, audio/video editors, content producers, creative directors, media designers, media photographers, social media managers, web designers and web strategists. Creative mass media concentration students take 48 hours of credit from Journalism and Strategic Media and 9 hours from the Department of Art focused on graphic design or photography.

#### Journalism

The Bachelor of Arts in Journalism trains students to become professionals in the news industry. Journalism graduates typically work at magazines, newspapers, television stations and online news outlets as anchors, content creators, editors, photographers, producers, reporters and social media managers. Journalism students take 48 hours of credit from Journalism and Strategic Media.

#### **Public Relations**

The Bachelor of Arts in Public Relations trains students to for careers in public relations in agency, corporate, nonprofit and freelance settings. The public relations program is offered on campus in Memphis, on campus at Lambuth and online through UofM Global. Public relations graduates typically work as account executives, corporate communications specialists, crisis specialists, event planners, researchers and social media managers. Public relations students graduate with multiple certifications, including social media analytics, Google tools, and media analysis. Public relations students take 48 hours of credit from Journalism and Strategic Media, 3 hours in Management and 6 hours in Marketing.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Strategic Social Media

The Bachelor of Arts in Public Relations, concentration in Strategic Social Media, equips students with the practical skills and critical knowledge that they need to use social media to deepen impact in any industry, including strategy development, digital analytics, paid and organic social campaigns, and audience research. Strategic Social Media concentration graduates typically work as social media managers, entrepreneurs, or as public relations professionals in government, corporate, nonprofit or agency settings. Strategic Social Media students take 48 hours of credit from Journalism and Strategic Media and 9 hours in Marketing.

## Advertising (B.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

### Journalism and Strategic Media Core (18 hours)

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours): JRSM 4702 - Media, Diversity & Society \*\* Credit Hours: (3) JRSM 4704 - Issues in Sport and Media Credit Hours: (3) JRSM 4708 - Media Ethics Credit Hours: (3) JRSM 4716 - Media History Credit Hours: (3) JRSM 4720 - Presidents and the Press Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours): JRSM 4930 - Media Internship \*\* Credit Hours: (3) JRSM 4940 - Student Media Practicum Credit Hours: (1-3)

## Advertising (30 hours Journalism and Strategic Media and 9 Marketing hours):

#### Major Core (21 hours)

ADVR 3300 - Intro to Advertising \*\* Credit Hours: (3) ADVR 3310 - Branding and Strategic Media Credit Hours: (3) ADVR 3324 - Creative Strategy Credit Hours: (3) ADVR 4326 - Advertising Research Credit Hours: (3) ADVR 4327 - Media Planning Credit Hours: (3) ADVR 4328 - Strategic Adv Campaigns Credit Hours: (3) ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php JRSM 3905 - Graphics for Strategic Media Credit Hours: (3) ADVR 3320 - Strategic Account Management Credit Hours: (3) ADVR 3330 - Analytics & Evaluation Credit Hours: (3) Or JRSM 3900 - Visual Media \*\* Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) CRMM 4900 - Creative Media Lab Credit Hours: (3)

## Marketing (9 hours)

```
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
MKTG 3012 - Consumer Behavior ** Credit Hours: (3)
MKTG 3340 - Principles of Social Media Marketing ** Credit Hours: (3)
```

## Electives

Completion of courses to bring the total to 120 semester hours.

## Typical 4-Year Advertising Sequence

## Freshman Year

```
JRSM 1700 - Intro to Media ** Credit Hours: (3) **
JRSM 1750 - Precision Language ** Credit Hours: (3)
Foreign Language/B.A. (3)
Social/Behavioral Sciences (3) *
ENGL 1010 - English Composition** Credit Hours: (3)
```

```
JRSM 2121 - Media Writing ** Credit Hours: (3)
JRSM 3900 - Visual Media ** Credit Hours: (3)
Foreign Language/B.A. (3)
Fine Arts (3) *
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
```

### Semester Totals 30 hrs

### Sophomore Year

ADVR 3300 - Intro to Advertising \*\* Credit Hours: (3) Non-JRSM Elective (Minor) (3) Foreign Language/B.A. (3) History (3) \* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

ADVR 3310 - Branding and Strategic Media Credit Hours: (3) Humanities/Fine Arts (3)\* Natural Science (4) \* Foreign Language/B.A. (3) MATH (3) \*

### Semester Totals 31 hrs

## Junior Year

ADVR 3324 - Creative Strategy Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* Non-JRSM Elective (Minor) (3)

CRMM 4900 - Creative Media Lab Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) Non-JRSM Elective (Minor) (3) Non-JRSM elective (Minor) (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3)

### Semester Totals 31 hrs

## Senior Year

```
ADVR 4326 - Advertising Research Credit Hours: (3)
ADVR 4327 - Media Planning Credit Hours: (3)
Non-JOUR Elective (Minor) (3)
Non-JOUR Elective (Minor) (1)
JRSM 4700 - Media Law ** Credit Hours: (3)
```

```
ADVR 4328 - Strategic Adv Campaigns Credit Hours: (3)
JRSM 4930 - Media Internship ** Credit Hours: (3) or
JRSM 4940 - Student Media Practicum Credit Hours: (1-3)
UD JRSM Elective (3)
ADVR/JOUR/JRSM/PBRL elective (3)
Non-JRSM Elective (Minor) (3)
```

### Semester Totals 28 hrs

## Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

# Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# Journalism (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3)

#### Core Elective

Select one of the following (3 hours): JRSM 4702 - Media, Diversity & Society \*\* Credit Hours: (3) JRSM 4704 - Issues in Sport and Media Credit Hours: (3) JRSM 4708 - Media Ethics Credit Hours: (3) JRSM 4716 - Media History Credit Hours: (3) JRSM 4720 - Presidents and the Press Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3)

#### Internship or Practicum

Select one of the following (3 hours): JRSM 4930 - Media Internship \*\* Credit Hours: (3) JRSM 4940 - Student Media Practicum Credit Hours: (1-3)

### Journalism Major Core (30 hours):

### Journalism Core (15 hours)

JRSM 3900 - Visual Media \*\* Credit Hours: (3)
JOUR 3526 - Multimedia Storytelling Credit Hours: (3)
JOUR 4998 - Multimedia News Lab Credit Hours: (3)
ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (6)
Note: Strongly encouraged to be a second internship. Must be approved by advisor.

### Additional Core Requirements (15 hours):

One of the following: (3 hours) JOUR 3120 - Reporting Credit Hours: (3) JOUR 3629 - Broadcast Reporting Credit Hours: (3) *Two of the following: (6 hours)* JOUR 3130 - Feature Writing/Reporting \*\* Credit Hours: (3) JOUR 4124 - Data Writing/Reporting Credit Hours: (3) JOUR 4150 - Sports Writing/Reporting Credit Hours: (3) JOUR 4160 - Food Writing/Reporting Credit Hours: (3) JOUR 4170 - Business Writing/Reporting Credit Hours: (3) JOUR 4180 - Public Issues Writing/Reporting Credit Hours: (3) JOUR 4190 - Opinion Writing/Reporting Credit Hours: (3) JOUR 4629 - TV News Writing/Reporting Credit Hours: (3) JOUR 4155 - Multimedia Sports Reporting Credit Hours: (3) Two of the following: (6 hours) JOUR 4530 - Innovative Storytelling Techniques Credit Hours: (3) JOUR 4639 - TV News Producing Credit Hours: (3) CRMM 4140 - Publication Design Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) CRMM 4526 - Advanced Photojournalism Credit Hours: (3) CRMM 4550 - Web Publish II: html/CSS Credit Hours: (3)

### Electives

Completion of courses to bring the total to 120 semester hours.

## Typical 4-Year Journalism Sequence

## Freshman Year

```
JRSM 1700 - Intro to Media ** Credit Hours: (3) **
JRSM 1750 - Precision Language ** Credit Hours: (3)
Foreign Language/B.A. (3)
Social/Behavioral Sciences (3) *
ENGL 1010 - English Composition** Credit Hours: (3)
```

JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 3900 - Visual Media \*\* Credit Hours: (3) Foreign Language/B.A. (3) Humanities/Fine Arts (3) \* ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)

### Semester Totals 30 hrs

### Sophomore Year

```
JOUR 3526 - Multimedia Storytelling Credit Hours: (3)
JOUR 3120 - Reporting Credit Hours: (3)
Foreign Language/B.A. (3)
History (3) *
ENGL 2201 - Literary Heritage ** Credit Hours: (3) or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

Humanities/Fine Arts (3) \* Natural Science (4) \* Foreign Language/B.A. (3) MATH (3) \* JOUR writing elective (3)

### Semester Totals 31 hrs

### Junior Year

```
Non-JRSM Elective (Minor) (3)
JOUR writing elective (3)
JOUR production elective (3)
History (3)
Natural Science* (4)
```

COMM 2381 - Oral Communication \*\* Credit Hours: (3) ADVR/JOUR/JRSM/PBRL elective (3) JOUR production elective (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (3)

### Semester Totals 30-31 hrs

### Senior Year

JRSM 4700 - Media Law \*\* Credit Hours: (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (1) JOUR 4998 - Multimedia News Lab Credit Hours: (3)

JRSM 4930 - Media Internship \*\* Credit Hours: (3) or JRSM 4940 - Student Media Practicum Credit Hours: (1-3) UD JRSM Elective (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (3)

#### Semester Totals 28 hrs

### Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# Journalism - Creative Mass Media Concentration, (B.A.)

## University General Education Program (41 hours)

See University General Education Program for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## Journalism and Strategic Media Core (18 hours)

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours): JRSM 4702 - Media, Diversity & Society \*\* Credit Hours: (3) JRSM 4704 - Issues in Sport and Media Credit Hours: (3) JRSM 4708 - Media Ethics Credit Hours: (3) JRSM 4716 - Media History Credit Hours: (3) JRSM 4720 - Presidents and the Press Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3)

#### Internship or Practicum

Select one of the following (3 hours): JRSM 4930 - Media Internship \*\* Credit Hours: (3) JRSM 4940 - Student Media Practicum Credit Hours: (1-3)

Creative Mass Media Concentration (30 hours)

### Concentration Core (15 hours):

JRSM 3900 - Visual Media \*\* Credit Hours: (3) ADVR 3324 - Creative Strategy Credit Hours: (3) JOUR 3526 - Multimedia Storytelling Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) CRMM 4900 - Creative Media Lab Credit Hours: (3)

Select three of the following (9 hours):

ADVR 4328 - Strategic Adv Campaigns Credit Hours: (3) CRMM 4140 - Publication Design Credit Hours: (3) CRMM 4220 - Print Communication Design Credit Hours: (3) CRMM 4526 - Advanced Photojournalism Credit Hours: (3) CRMM 4550 - Web Publish II: html/CSS Credit Hours: (3) CRMM 4560 - Interactive Media Design Credit Hours: (3) CRMM 4920 - Information Design Credit Hours: (3)

### Concentration Elective (6 hours):

ADVR/JOUR/JRSM/PBRL ELECTIVE **Credit Hours:** (6) Note: Strongly encouraged to be a second internship. Must be approved by advisor.

## Art (Select one focus) 9 hours:

Graphic Design Focus Photography Focus

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Creative Mass Media Sequence

## Freshmen Year

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) Foreign Language/B.A. Social Science (3) ENGL 1010 - English Composition\*\* Credit Hours: (3)

JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 3900 - Visual Media \*\* Credit Hours: (3) Foreign Language/B.A. Humanities/Fine Arts (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

JOUR 3526 - Multimedia Storytelling Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) Foreign Language/B.A. History (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*

ADVR 3324 - Creative Strategy Credit Hours: (3) Humanities/Fine Arts (3) Natural Science (4) Foreign Language/B.A. Math (3)

### Semester Totals 31 hours

#### Junior Year

Non-JRSM Elective (Minor) (3) CMM elective (3) CMM elective (3) History (3) Natural Science (3)

COMM 2381 - Oral Communication \*\* ADVR/JOUR/JRSM/PBRL elective (3) CMM elective (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (3)

### Semester Totals 31 hours

### Senior Year

```
JRSM 4700 - Media Law ** Credit Hours: (3)
Non-JRSM Elective (Minor) (3)
Non-JRSM Elective (Minor) (3)
Non-JRSM Elective (Minor) (1)
JRSM 4930 - Media Internship ** Credit Hours: (3) OR JRSM 4940 - Student Media Practicum (3)
```

CRMM 4900 - Creative Media Lab Credit Hours: (3) UD JRSM Elective (3) Non-JRSM Elective (Minor) (3) Non-JRSM Elective (Minor) (3)

### Semester Totals 28 hours

### Total Hours: 120

Internship elective highly recommended in final year to enhance employability and complete minimum of 120 hours for degree.

### Total Hours required for Graduation: 120

\* Must satisy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# **Public Relations - (B.A.)**

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

## Journalism and Strategic Media Core (18 hours)

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3)

### **Core Elective**

Select one of the following (3 hours): JRSM 4702 - Media, Diversity & Society \*\* Credit Hours: (3) JRSM 4704 - Issues in Sport and Media Credit Hours: (3) JRSM 4708 - Media Ethics Credit Hours: (3) JRSM 4716 - Media History Credit Hours: (3) JRSM 4720 - Presidents and the Press Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3)

### Internship or Practicum

Select one of the following (3 hours): JRSM 4930 - Media Internship \*\* Credit Hours: (3) JRSM 4940 - Student Media Practicum Credit Hours: (1-3)

## Public Relations Major Core (12 hours):

JRSM 3905 - Graphics for Strategic Media Credit Hours: (3) JOUR 3526 - Multimedia Storytelling Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3)

### Additional Core Requirements (18 hours):

PBRL 4410 - Public Relations Research Credit Hours: (3) PBRL 4440 - Public Relations Campaigns \*\* Credit Hours: (3) Two of the following: (6 hours) PBRL 3409 - Public Relations Case Studies Credit Hours: (3) PBRL 3431 - Advanced PR Writing Credit Hours: (3) PBRL 4301 - Event Planning for PR Credit Hours: (3) PBRL 4421 - Crisis Comm in Public Relation Credit Hours: (3) PBRL 4430 - Media Relations Credit Hours: (3) PBRL 4431 - Music Promo/Public Relations Credit Hours: (3) Two of the following: (6 hours) ADVR 3300 - Intro to Advertising \*\* Credit Hours: (3) ADVR 3310 - Branding and Strategic Media Credit Hours: (3) ADVR 3320 - Strategic Account Management Credit Hours: (3) ADVR 3330 - Analytics & Evaluation Credit Hours: (3) JRSM 3900 - Visual Media \*\* Credit Hours: (3) CRMM 4920 - Information Design Credit Hours: (3) PBRL 3441 - Writing for Social Media Credit Hours: (3) PBRL 4450 - Social Media Tactics/Analytics Credit Hours: (3)

### Business courses (9 hours):

Required Fogelman College of Business & Economics courses:

```
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
MKTG 3340 - Principles of Social Media Marketing ** Credit Hours: (3)
```

## Electives

Completion of courses to bring the total to 120 semester hours.

## Typical 4-Year Public Relations Sequence

### Freshman Year

```
JRSM 1700 - Intro to Media ** Credit Hours: (3) **
JRSM 1750 - Precision Language ** Credit Hours: (3)
Foreign Language/B.A. (3)
Social/Behavioral Sciences (3) *
ENGL 1010 - English Composition** Credit Hours: (3)
```

```
JRSM 2121 - Media Writing ** Credit Hours: (3)
JRSM 3900 - Visual Media ** Credit Hours: (3)
Foreign Language/B.A. (3)
Humanities/Fine Arts (3) *
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

PBRL 3400 - Intro to Public Relations Credit Hours: (3) Non-JRSM elective (Minor) (3) Foreign Language/B.A. (3) History (3) \* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*

```
PBRL 3421 - Public Relations Writing ** Credit Hours: (3)
Natural Science* (4)
Foreign Language/BA (3)
Fine Arts* (3)
Math* (3)
```

#### Semester Totals 31 hrs

### Junior Year

```
JOUR 3120 - Reporting Credit Hours: (3) or JOUR 3130 - Feature Writing/Reporting ** or JOUR 3526 - Multimedia Storytelling
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
Natural Science (4) *
History (3) *
Non-JRSM Elective (Minor) (3)
```

PBRL 4301 - Event Planning for PR Credit Hours: (3) or PBRL 4421 - Crisis Comm in Public Relation or PBRL 4430 - Media Relations or PBRL 4431 - Music Promo/Public Relations
MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
Non-JRSM Elective (Minor) (3)
Non-JRSM Elective (Minor) (3)

### Semester Totals 31 hrs

### Senior Year

PBRL 4410 - Public Relations Research Credit Hours: (3)
ADVR/JOUR/JRSM/PBRL Elective (3)
JRSM 4700 - Media Law \*\* Credit Hours: (3)
Non-JRSM Elective (Minor) (3)
Non-JRSM Elective (Minor) (1)
JRSM 4930 - Media Internship \*\* Credit Hours: (3)
or
JRSM 4940 - Student Media Practicum Credit Hours: (1-3)
PBRL 4440 - Public Relations Campaigns \*\* Credit Hours: (3)
UD JRSM Elective (3)
ADVR 3300 - Intro to Advertising \*\* Credit Hours: (3) or
ADVR 3310 - Branding and Strategic Media Credit Hours: (3) or
JRSM 4910 - Social Media and Society\*\* Credit Hours: (3) or
CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3)

Semester Totals 28 hrs

Non-JOUR Elective (Minor) (3)

## Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

\*\*\*Unless Fine Arts was taken in General Education humanities/Fine Arts, take Non-JOUR Elective (Minor)

# Public Relations - Strategic Social Media Concentration, (B.A.)

The Bachelor of Arts in Public Relations, concentration in Strategic Social Media, equips students with the practical skills and critical knowledge that they need to use social media to deepen impact in any industry, including strategy development, digital analytics, paid and organic social campaigns, and audience research. Strategic Social Media concentration graduates typically work as social media managers, entrepreneurs, or as public relations professionals in government, corporate, nonprofit or agency settings.

## University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

## College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

### Journalism and Strategic Media Core (18 hours)

JRSM 1700 - Intro to Media \*\* Credit Hours: (3) JRSM 1750 - Precision Language \*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3)

### Core Elective

Select one of the following (3 hours): JRSM 4702 - Media, Diversity & Society \*\* Credit Hours: (3) JRSM 4704 - Issues in Sport and Media Credit Hours: (3) JRSM 4708 - Media Ethics Credit Hours: (3) JRSM 4716 - Media History Credit Hours: (3) JRSM 4720 - Presidents and the Press Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3)

#### Internship or Practicum

Select one of the following (3 hours): JRSM 4930 - Media Internship \*\* Credit Hours: (3) JRSM 4940 - Student Media Practicum Credit Hours: (1-3)

### Public Relations Major Core (12 hours):

JRSM 3905 - Graphics for Strategic Media Credit Hours: (3) JOUR 3526 - Multimedia Storytelling Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3) PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3) ADVR 3324 - Creative Strategy Credit Hours: (3) ADVR 3330 - Analytics & Evaluation Credit Hours: (3) PBRL 3441 - Writing for Social Media Credit Hours: (3) PBRL 4450 - Social Media Tactics/Analytics Credit Hours: (3) ADVR/CRMM/JOUR/JRSM/PBRL Electives Credit Hours: (6)

## Business courses (9 hours)

Required Fogelman College of Business & Economics courses:

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3)

### Electives

Completion of courses to bring the total to 120 semester hours.

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Typical 4-Year Public Relations – Strategic Social Media Concentration Sequence

### Freshman Year

#### First Semester:

ENGL 1010 - English Composition\*\* Credit Hours: (3) JRSM 1700 - Intro to Media \*\* Credit Hours: (3) \*\* JRSM 1750 - Precision Language \*\* Credit Hours: (3) Foreign Language/B.A. Credit Hours: (3) Social/Behavioral Sciences Credit Hours: (3) \*

Second Semester:

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) JRSM 2121 - Media Writing \*\* Credit Hours: (3) JRSM 3905 - Graphics for Strategic Media Credit Hours: (3) Foreign Language/B.A. Credit Hours: (3) Humanities/Fine Arts Credit Hours: (3) \*

#### Semester Totals 30 hrs

### Sophomore Year

#### First Semester:

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* PBRL 3400 - Intro to Public Relations Credit Hours: (3) Non-JRSM elective (Minor) Credit Hours: (3) Foreign Language/B.A. Credit Hours: (3) History Credit Hours: (3) \*

Second Semester:

PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3)
Natural Science\* Credit Hours: (4)
Foreign Language/BA Credit Hours: (3)
Math\* Credit Hours: (3)
MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)

#### Semester Totals 31 hrs

### Junior Year

First Semester: JOUR 3526 - Multimedia Storytelling Credit Hours: (3) PBRL 3441 - Writing for Social Media Credit Hours: (3) MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) Fine Arts\* Credit Hours: (3) Natural Science Credit Hours: (4) \*

Second Semester: ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) History Credit Hours: (3)\* Non-JRSM Elective (Minor) Credit Hours: (3) Non-JRSM Elective (Minor) Credit Hours: (3)

#### Semester Totals 31 hrs

#### Senior Year

First Semester: ADVR 3324 - Creative Strategy Credit Hours: (3) ADVR 3330 - Analytics & Evaluation Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) ADVR/JOUR/JRSM/PBRL Elective Credit Hours: (3)

Second Semester:

PBRL 4450 - Social Media Tactics/Analytics Credit Hours: (3)
JRSM Values Elective (JRSM 4702/4704/4708/4716/4720/4910) Credit Hours: (3)
JRSM 4930 - Media Internship \*\* Credit Hours: (3)
or
JRSM 4940 - Student Media Practicum Credit Hours: (1-3)
Non-JOUR Elective (Minor) Credit Hours: (3)

#### Semester Totals 28 hours

## Total Hours: 120

Internship elective highly recommended last semester to enhance employability and complete minimum of 120 hours for degree.

## Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*JRSM 1700 fulfills Social Science General Education Requirement

# **Advertising Minor**

To complete the minor in Advertising, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

## Advertising Minor Core

JRSM 1750 - Precision Language \*\* Credit Hours: (3)
JRSM 2121 - Media Writing \*\* Credit Hours: (3)
ADVR 3300 - Intro to Advertising \*\* Credit Hours: (3)
Select Three of the Following:
JRSM 3900 - Visual Media \*\* Credit Hours: (3)
JRSM 3905 - Graphics for Strategic Media Credit Hours: (3)
ADVR 3310 - Branding and Strategic Media Credit Hours: (3)
ADVR 3320 - Strategic Account Management Credit Hours: (3)
ADVR 3320 - Analytics & Evaluation Credit Hours: (3)
ADVR 3324 - Creative Strategy Credit Hours: (3)
ADVR 4326 - Advertising Research Credit Hours: (3)
ADVR 4327 - Media Planning Credit Hours: (3)
ADVR 4328 - Strategic Adv Campaigns Credit Hours: (3)

## **Creative Mass Media Minor**

To complete the minor in Creative Mass Media, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

## Creative Mass Media Minor Core

To complete a minor in Creative Mass Media, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

```
JRSM 1750 - Precision Language ** Credit Hours: (3)
JRSM 2121 - Media Writing ** Credit Hours: (3)
JRSM 3900 - Visual Media ** Credit Hours: (3)
JOUR 3526 - Multimedia Storytelling Credit Hours: (3)
```

Select two of the following: ADVR 3324 - Creative Strategy Credit Hours: (3) CRMM 4140 - Publication Design Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) CRMM 4526 - Advanced Photojournalism Credit Hours: (3) CRMM 4550 - Web Publish II: html/CSS Credit Hours: (3) CRMM 4560 - Interactive Media Design Credit Hours: (3) CRMM 4900 - Creative Media Lab Credit Hours: (3)

Coursework for all minors will be determined by the student in conference with the advisor with the approval of the department chair.

## **Journalism Minor**

To complete the minor in Journalism, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

793

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

## Journalism Minor Core

```
JRSM 1750 - Precision Language ** Credit Hours: (3)
JRSM 2121 - Media Writing ** Credit Hours: (3)
JOUR 3526 - Multimedia Storytelling Credit Hours: (3)
```

#### Select One of the Following: (3 hours)

JOUR 3120 - Reporting Credit Hours: (3) JOUR 3629 - Broadcast Reporting Credit Hours: (3)

#### Select Two of the Following: (6 hours)

JOUR 3130 - Feature Writing/Reporting \*\* Credit Hours: (3) JOUR 4124 - Data Writing/Reporting Credit Hours: (3) JOUR 4150 - Sports Writing/Reporting Credit Hours: (3) JOUR 4155 - Multimedia Sports Reporting Credit Hours: (3) JOUR 4160 - Food Writing/Reporting Credit Hours: (3) JOUR 4170 - Business Writing/Reporting Credit Hours: (3) JOUR 4180 - Public Issues Writing/Reporting Credit Hours: (3) JOUR 4190 - Opinion Writing/Reporting Credit Hours: (3) JOUR 4530 - Innovative Storytelling Techniques Credit Hours: (3) JOUR 4629 - TV News Writing/Reporting Credit Hours: (3) JOUR 4639 - TV News Producing Credit Hours: (3) CRMM 4140 - Publication Design Credit Hours: (3) CRMM 4500 - Web Publish I: html/CSS Credit Hours: (3) CRMM 4526 - Advanced Photojournalism Credit Hours: (3) CRMM 4550 - Web Publish II: html/CSS Credit Hours: (3) CRMM 4920 - Information Design Credit Hours: (3)

## **Public Relations Minor**

To complete the minor in Public Relations, a student must earn 18 hours of credit in the Department of Journalism and Strategic Media meeting the following conditions:

(NOTE: Coursework for the minor will be determined by the student in conference with the advisor with the approval of the department chair.)

## **Public Relations Minor Core**

JRSM 1750 - Precision Language \*\* Credit Hours: (3)
JRSM 2121 - Media Writing \*\* Credit Hours: (3)
PBRL 3400 - Intro to Public Relations Credit Hours: (3)
PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3)
Select two of the Following:
JRSM 3900 - Visual Media \*\* Credit Hours: (3)
JRSM 3905 - Graphics for Strategic Media Credit Hours: (3)
PBRL 4301 - Event Planning for PR Credit Hours: (3)
PBRL 4410 - Public Relations Research Credit Hours: (3)
PBRL 4421 - Crisis Comm in Public Relation Credit Hours: (3)
PBRL 4430 - Media Relations Credit Hours: (3)

## Advertising-Journalism and Strategic Media (Accelerated BA/MA)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year. Students interested in the ABM program should talk with their adviser as early in their studies as possible and apply before they have completed 90 credit hours. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

1. Student fills out department's online application.

2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.

3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

## Journalism-Journalism and Strategic Media (Accelerated BA/MA)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year.

Students interested in the ABM program should talk with their adviser as early in their studies as possible and apply before they have completed 90 credit hours. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

1. Student fills out department's online application.

2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.

3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

795

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

## Public Relations-Journalism and Strategic Media (Accelerated BA/MA)

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Journalism and Strategic Media during their senior year.

Students interested in the ABM program should talk with their adviser as early in their studies as possible and <u>apply before they have completed 90</u> <u>credit hours</u>. Working with the undergraduate adviser and the graduate director, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To apply, students should have a minimum 3.25 overall grade point average and a 3.5 in their major, and then must submit a copy of their transcript and two reference letters from Department of Journalism and Strategic Media faculty to the graduate director. Each applicant will complete an interview with the graduate director.

#### How to Apply:

Once the student has discussed the ABM option with his or her adviser, here are the application steps:

1. Student fills out department's online application.

2. After the application is submitted, the student asks their faculty recommenders to send their letters to the graduate director.

3. The applicant will then meet with the graduate director for an interview.

4. The graduate director will make a recommendation to the graduate faculty to approve or disapprove the ABM application, based on the student's GPA, letters of recommendation, resume, goal statement, transcript and interview.

5. If the application is approved, the student will meet with his or her adviser, to create a graduation plan for his or her last two semesters. This plan will include up to 12 graduate credits that will then count toward both the B.A. and M.A. degrees.

6. After this plan is finalized, the graduate director will send to the college graduation analyst the student's Combination Senior Form and Accelerated BA/MA Form.

7. The college graduation analyst will verify that the student is within two semesters of graduating the BA and notify the graduate school of the student's ABM status.

8. Before beginning the MA program, the student must formally apply to the UofM graduate school by submitting an application, a resume and a goal statement.

## **Rudi E. Scheidt School of Music**

#### Rudi E. Scheidt School of Music

Program objectives for a B.M. in Music are: (a) to be prepared for entrance into accredited graduate programs in music; (b) to be prepared to pursue graduate studies in music performance; (c) to be prepared to pursue careers in the music profession.

The Bachelor of Music with a major in Music is a professional degree, the requirements for which provide the student with an opportunity for specialization in the traditional disciplines of music and music education. A minimum grade of "C-" is required in every graded music course applicable toward the major. The student must maintain an overall grade point average of 2.0. Exception: Music Education concentration: overall grade point average of 2.75 and a minimum grade of "C-" in each professional education and music course.

The specific degree requirements are divided into four groups: (1) University General Education Program, (2) basic music courses, (3) courses required for the specific emphasis chosen by the student, (4) electives to bring the total of semester hours taken to 120 (124 hours for Music Education choral emphasis, 125 hours for Music Education instrumental emphasis). All students must complete a minimum of 42 hours at the upper division level. Transfer students must complete a minimum of 30 semester hours of music and/or music education courses at the upper division level at the University of Memphis.

796

Admission: All applicants seeking admission as freshman music majors or as transfer students must complete and submit to the Admissions Office of the University of Memphis an appropriate formal application form. In addition to academic considerations, admission to the music degree program requires a personal interview and an audition. The audition consists of (1) performance in the student's major applied area, (2) a music theory examination and (3) a piano placement exam. Candidates are accepted on the basis of accomplishment, potential and suitability for the concentration they wish to pursue. Additional information on specific audition requirements and on interview/audition appointments may be obtained through the office of the School of Music or at <a href="http://www.memphis.edu/music">http://www.memphis.edu/music</a>.

## **Music Industry**

The Bachelor of Music degree in Music Industry is designed for students whose interests and abilities indicate a strong potential for significant achievement in the music industry.

Two concentrations are available: Music Business and Recording Technology

Admission: Admission is based on selective procedures, and admission to the University does not guarantee placement in the Music Industry Program. Stringent quality control is essential; therefore, an assessment is required of all students desiring to enter the program. Entrance requirements vary by concentration. Specific admissions criteria may be obtained through the office of the Director, School of Music. Through the admissions procedure, preliminary estimates of student commitment and potential success can be made. Upon admission, the student will be assigned an advisor.

Retention: The student's progress and continued potential will be reviewed twice yearly by the appropriate Music Industry faculty. Permission to continue in the program will be based upon this evaluation. Retention criteria may be obtained through the office of the Director, School of Music.

Ensembles: Students in Music Business or Recording Technology must complete two (2) credit hours of ensemble.

Concert Attendance: All students in Music Business and Recording Technology are required to attend a minimum of 50 concerts or recitals during their four-year program. Records will be maintained in the School on the number of events attended by each student and a report will be filed with the Director of the School each year.

Experiential Learning: Credit may be awarded for validated learning from experience or non-traditional instruction. Students who wish to apply for credit for experiential learning may obtain guidelines for this procedure from the Dean of the College of Communication and Fine Arts. (See Fees and Charges, for related fee information.)

Graduation from the Program: A minimum of 120 hours is required for graduation; a minimum grade of "C-" is required in every graded course applicable to the major as well as an overall grade point average of 2.5.

## Music

Program objectives for a B.M. in Music are: (a) to be prepared for entrance into accredited graduate programs in music; (b) to be prepared to pursue graduate studies in music performance; (c) to be prepared to pursue careers in the music profession.

The Bachelor of Music with a major in Music is a professional degree, the requirements for which provide the student with an opportunity for specialization in the traditional disciplines of music and music education. A minimum grade of "C-" is required in every graded music course applicable toward the major. The student must maintain an overall grade point average of 2.0. Exception: Music Education concentration: overall grade point average of 2.75 and a minimum grade of "C-" in each professional education and music course.

The specific degree requirements are divided into four groups: (1) University General Education Program, (2) basic music courses, (3) courses required for the specific emphasis chosen by the student, (4) electives to bring the total of semester hours taken to 120 (124 hours for Music Education choral emphasis, 125 hours for Music Education instrumental emphasis). All students must complete a minimum of 42 hours at the upper division level. Transfer students must complete a minimum of 30 semester hours of music and/or music education courses at the upper division level at the University of Memphis.

Admission: All applicants seeking admission as freshman music majors or as transfer students must complete and submit to the Admissions Office of the University of Memphis an appropriate formal application form. In addition to academic considerations, admission to the music degree program requires a personal interview and an audition. The audition consists of (1) performance in the student's major applied area, (2) a music theory examination and (3) a piano placement exam. Candidates are accepted on the basis of accomplishment, potential and suitability for the concentration they wish to pursue. Additional information on specific audition requirements and on interview/audition appointments may be obtained through the office of the School of Music or at http://www.memphis.edu/music.

797

## Music - Composition Concentration. (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

## Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (85 hours)

Major Core (43 hours)

## **Core Requirements**

## Completion of (16 hours):

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1)

## Theory Elective (One from the Following):

MUTC 3101 - Orchestration Credit Hours: (3) MUTC 3102 - Analysis of Tonal Music Credit Hours: (3) MUTC 3109 - Advanced Analysis of Post-Tonal Music Credit Hours: (3) MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3) MUTC 4205 - 16th Cent Counterpoint Credit Hours: (2) MUTC 4206 - 18th Cent Counterpoint Credit Hours: (2) MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3)

## **Music History**

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3) MUHL 4008 - The Symphony Credit Hours: (3) MUHL 4009 - Choral Literature I Credit Hours: (3) MUHL 4010 - Choral Literature II Credit Hours: (3) MUHL 4013 - Women and Music Credit Hours: (3) MUHL 4406 - Music since 1900 Credit Hours: (3) MUHL 4407 - History of Opera Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

## Basic Conducting (2 hours):

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

MUAP 1105 - Class Piano I Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP 2107 - Class Piano III Credit Hours: (1) MUAP 2108 - Class Piano IV Credit Hours: (1)

## Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (42 hours)

## Composition:

Individual instruction in applied music to include two semesters of piano (8)

MUTC 2501 - Composition Credit Hours: (1-3) MUTC 2502 - Composition Credit Hours: (1-3) minimum two semesters MUTC 4501 - Composition Credit Hours: (3) (minimum three semesters) MUTC 4511 - Electronic Music II Credit Hours: (2) MUTC 4512 - Electronic Music III Credit Hours: (2) MUTC 4209 - Advanced Orchestration Credit Hours: (3) MUTC 4599 - Senior Composition Recital Credit Hours: (4)

#### Choose One of the Following Courses:

MUTC 4205 - 16th Cent Counterpoint Credit Hours: (2) MUTC 4206 - 18th Cent Counterpoint Credit Hours: (2)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Composition Concentration Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)

MUTC 1008 - Music Theory I Credit Hours: (3)

MUTC 1010 - Ear Training I Credit Hours: (1)

MUAP 1105 - Class Piano I Credit Hours: (1)

MUAP (applied music) (2)

MUAP (large ensemble) (1)

MUTC 2501 - Composition Credit Hours: (1-3)

ENGL 1020 - English Comp/Analysis** Credit Hours: (3)

MUTC 1009 - Music Theory II Credit Hours: (3)

MUTC 1011 - Ear Training II Credit Hours: (1)

MUAP 1106 - Class Piano II Credit Hours: (1)

MUAP (applied music) (2)

MUAP (large ensemble) (1)

MUID 1001 - Intro Music Technology Credit Hours: (1)
```

#### Semester Totals 26 hrs

#### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
Natural Science (4) *
MUTC 2008 - Chromatic Harmony Credit Hours: (3)
MUTC 2010 - Ear Training III Credit Hours: (1)
MUAP (applied music) (2)
MUAP (large ensemble) (1)
MUAP 2502 (3)
MUAP 2107 - Class Piano III Credit Hours: (1)
MUTC 2502 - Composition Credit Hours: (1-3)
Natural Science (4) *
MATH (3) *
MUAP (large ensemble) (1)
MUTC 3008 - Post-Tonal Music Credit Hours: (3)
MUTC 3009 - Ear Training IV Credit Hours: (1)
MUAP 2108 - Class Piano IV Credit Hours: (1)
MUAP (applied music) (2)
```

## Semester Totals 36 hrs

## Junior Year

```
History (3) *

COMM 2381 - Oral Communication ** Credit Hours: (3)

MUHL 3301 - History of Music to 1750 Credit Hours: (3)

MUTC 4209 - Advanced Orchestration Credit Hours: (3)

MUAP (large ensemble) (1)

MUTC 4501 - Composition Credit Hours: (3)

MUSE 3700 - Basic Conducting Credit Hours: (2)

History (3) *

MUTC 420x (2)

MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

MUTC 4511 - Electronic Music II Credit Hours: (2)

MUAP (large ensemble) (1)

MUTC 4501 - Composition (3)
```

## Semester Totals 32 hrs

## Senior Year

```
Social/Behavioral Sciences (3) *

MUTC 4501 - Composition Credit Hours: (3)

MUTC 4512 - Electronic Music III Credit Hours: (2)

Theory elective (3)

MUAP (large ensemble) (1)

MUTC 4599 - Senior Composition Recital Credit Hours: (4)

MUHL elective (3) **

MUAP (large ensemble) (1)

MUTC 4106 - Composition Procsses 20th Cent Credit Hours: (3)

Social/Behavioral Sciences (3) *
```

## Semester Totals 26 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## Music - Jazz and Studio Composition/Arranging Concentration, (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 4806.

## Admission to the Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (42 hours)

Completion of (19 hours)

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 2103 - Theory Jazz/Pop/Commercial I Credit Hours: (3) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1)

## **Music History**

MUHL 3303 - Western Music History Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3)

History Elective (One From the Following) (3 Hours):

MUHL 4013 - Women and Music Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

## Basic Conducting (2 hours)

MUSE 3700 - Basic Conducting Credit Hours: (2)

## Piano

MUAP 1105 - Class Piano I Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP 1116 - Jazz Class Piano Credit Hours: (1)

## Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education The online catalog can be accessed at: http://catalog.memphis.edu/index.php

802 Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (43 hours)

## Jazz and Studio Composition/Arranging

MUAP 1312 - Commerical Music Piano Credit Hours: (2)

```
Pianists take:

MUAP 1550 - Guitar Intro Instr Credit Hours: (1)

OR

MUSE 1119 - Guitar/Music Teacher Credit Hours: (1)

MUTC 2501 - Composition Credit Hours: (1-3)

MUTC 2504 - Comp/Arrange Jazz/Commrcial II Credit Hours: (2)

MUTC 2511 - Electronic Music I Credit Hours: (2)

MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3)

MUTC 3501 - Comp/Arrang/Jazz/Comrcial III Credit Hours: (3)

MUTC 3825 - Material/Techniques Improv I Credit Hours: (3)

MUTC 4106 - Composition Procsses 20th Cent Credit Hours: (3)

MUTC 4503 - Comp/Arrange Jazz/Commrcial IV Credit Hours: (3)

MUTC 4896 - Sr Prj Jazz Studio/Comp Arrang Credit Hours: (4)

MUAP 1xx2 (5)
```

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Jazz Composition and Arranging Concentration Sequence

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Social/Behavioral Sciences (3) *
MUTC 1008 - Music Theory I Credit Hours: (3)
MUTC 1010 - Ear Training I Credit Hours: (1)
MUAP 1105 - Class Piano I Credit Hours: (1)
MUAP (applied music) (2)
MUTC 1001 - Basic Music Theory Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Social/Behavioral Sciences (3) *
MUTC 1009 - Music Theory II Credit Hours: (3)
MUTC 1011 - Ear Training II Credit Hours: (1)
MUAP 1106 - Class Piano II Credit Hours: (1)
MUTC 2501 - Composition Credit Hours: (1-3)
MUAP 1116 - Jazz Class Piano Credit Hours: (1)
```

#### Semester Totals 29 hrs

## Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
    or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
MUTC 2008 - Chromatic Harmony Credit Hours: (3)
MUTC 2010 - Ear Training III Credit Hours: (1)
MUAP (applied music) (3)
MUTC 3825 - Material/Techniques Improv | Credit Hours: (3)
MUTC 2103 - Theory Jazz/Pop/Commercial | Credit Hours: (3)
MUAP 3012 - Univ Instrumentl Jazz Ensemble Credit Hours: (1)
    or
MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1)
MATH (3) *
Music elective (3)
MUAP 3103 - Commercial Music Combo Credit Hours: (1)
MUTC 3008 - Post-Tonal Music Credit Hours: (3)
MUTC 3009 - Ear Training IV Credit Hours: (1)
MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3)
MUAP 3012 - Univ Instrumentl Jazz Ensemble (1)
MUAP 3013 - Univ Voice Jazz Ensemble
```

#### Semester Totals 32 hrs

#### Junior Year

```
Natural Science (4) *
MUSE 3700 - Basic Conducting Credit Hours: (2)
MUAP 1312 - Commerical Music Piano Credit Hours: (2)
MUTC 2511 - Electronic Music | Credit Hours: (2)
COMM 2381 - Oral Communication ** Credit Hours: (3)
MUTC 2504 - Comp/Arrange Jazz/Commrcial II Credit Hours: (2)
MUAP 3012 - Univ Instrumentl Jazz Ensemble Credit Hours: (1)
    or
MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1)
Natural Sciences (4) *
History (3) *
MUHL 3303 - Western Music History Credit Hours: (3)
MUAP 1312 - Commerical Music Piano (2)
MUAP 3012 - Univ Instrumentl Jazz Ensemble (1)
    or
MUAP 3013 - Univ Voice Jazz Ensemble (1)
MUTC 3501 - Comp/Arrang/Jazz/Comrcial III Credit Hours: (2)
```

## Semester Totals 31 hrs

## Senior Year

History (3) \* MUTC 4503 - Comp/Arrange Jazz/Commrcial IV Credit Hours: (3) Music Elective (3) MUAP 3012 - Univ InstrumentI Jazz Ensemble Credit Hours: (1) or MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1) MUHL Elective (3) MUAP 3103 - Commercial Music Combo Credit Hours: (1) Music Elective (3) MUAP 4896 (4) MUHL 4806 - History of Jazz Credit Hours: (3) MUTC 4106 - Composition Procsses 20th Cent Credit Hours: (3) MUAP 3012 - Univ InstrumentI Jazz Ensemble (1) or MUAP 3013 - Univ Voice Jazz Ensemble (1)

### Semester Totals 28 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Music - Jazz and Studio Performance Concentration, (B.M.)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 4806.

## Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (85 hours)

Major Core (42 hours)

## **Core Requirements**

Completion of (19 hours):

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 2103 - Theory Jazz/Pop/Commercial I Credit Hours: (3) MUTC 3008 - Post-Tonal Music Credit Hours: (3)

#### Music History

MUHL 3303 - Western Music History Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3)

History Elective (One from the Following) (3 hours):

MUHL 4013 - Women and Music Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

### Basic Conducting (2 hours):

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

MUAP 1105 - Class Piano | Credit Hours: (1) MUAP 1106 - Class Piano || Credit Hours: (1) MUAP 1116 - Jazz Class Piano Credit Hours: (1)

#### Intro Music Technology

```
MUID 1001 - Intro Music Technology Credit Hours: (1)
```

#### **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

#### Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (43 hours)

### Jazz and Studio Performance

NOTE: Jazz vocal students take MUHL 4016 instead of MUTC 3827.

MUAP 1XX1 (1), 1XX2 (10) MUAP 3103 - Commercial Music Combo Credit Hours: (1) Credits / Units: 5 4xx2 (4) MUAP 4895 - Sr Proj Jazz/Studio Perform Credit Hours: (3) MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3) MUTC 3825 - Material/Techniques Improv | Credit Hours: (3) ENGL 1010 - English Composition\*\* Credit Hours: (3)

MUTC 1008 - Music Theory | Credit Hours: (3) MUTC 1010 - Ear Training | Credit Hours: (1) MUAP 1105 - Class Piano | Credit Hours: (1)

#### Jazz Vocal Students Take

MUHL 4016 - Jazz Vocal Styles Credit Hours: (3) instead of MUTC 3827.

## Electives (0 - 12 hours)

Social/Behavioral Sciences (3) \*

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Jazz and Studio Performance Concentration Sequence

### **Freshman Year**

```
MUAP (applied music) (2)
    MUAP 3012 - Univ Instrumentl Jazz Ensemble Credit Hours: (1)
        or
    MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1)
    MUID 1001 - Intro Music Technology Credit Hours: (1)
    ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
    Social/Behavioral Sciences (3) *
    MUTC 1009 - Music Theory II Credit Hours: (3)
    MUTC 1011 - Ear Training II Credit Hours: (1)
    MUAP 1106 - Class Piano II Credit Hours: (1)
    MUAP (applied music) (2)
    MUAP 3012 - Univ Instrumentl Jazz Ensemble (1)
        or
    MUAP 3013 - Univ Voice Jazz Ensemble (1)
    MUAP 1116 - Jazz Class Piano Credit Hours: (1)
Semester Totals 30 hrs
Sophomore Year
    History (3) *
    MUTC 2008 - Chromatic Harmony Credit Hours: (3)
    MUTC 2010 - Ear Training III Credit Hours: (1)
    MUAP (applied music) (2)
    MUTC 3825 - Material/Techniques Improv I Credit Hours: (3)
    MUTC 2103 - Theory Jazz/Pop/Commercial | Credit Hours: (3)
    MUAP 3012 - Univ Instrumentl Jazz Ensemble Credit Hours: (1)
    MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1)
```

MUAP 3103 - Commercial Music Combo Credit Hours: (1) MATH (3) \* History (3) \* MUAP 3103 - Commercial Music Combo (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1) MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3) MUAP (applied music) (2)

MUAP 3012 - Univ Instrumentl Jazz Ensemble (1) or MUAP 3013 - Univ Voice Jazz Ensemble (1)

#### Semester Totals 34 hrs

#### Junior Year

```
Natural Science (4) *
MUSE 3700 - Basic Conducting Credit Hours: (2)
MUAP 3103 - Commercial Music Combo Credit Hours: (1)
MUTC 3826 - Material/Techniques Improv II Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
MUAP (applied music) (2)
MUAP 3012 - Univ Instrumentl Jazz Ensemble Credit Hours: (1)
    or
MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1)
Natural Sciences (4) *
MUAP 3103 - Commercial Music Combo (1)
MUHL 3303 - Western Music History Credit Hours: (3)
MUAP (2nd instrument) (1)
MUAP 3012 - Univ Instrumentl Jazz Ensemble (1)
    or
MUAP 3103 - Commercial Music Combo (1)
Elective (2)
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
    or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

#### Semester Totals 31 hrs

## Senior Year

MUID 3827 (3) Music Elective (3) MUAP 3103 - Commercial Music Combo Credit Hours: (1) MUAP 3012 - Univ InstrumentI Jazz Ensemble Credit Hours: (1) or MUAP 3013 - Univ Voice Jazz Ensemble Credit Hours: (1) MUAP 4xx2 (2)

MUAP 4XX2 (2) MUHL Elective (3) Elective (3) MUAP 4895 - Sr Proj Jazz/Studio Perform Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUAP 4xx2 (2)

MUAP 3012 - Univ Instrumentl Jazz Ensemble (1) or MUAP 3013 - Univ Voice Jazz Ensemble (1)

## Semester Totals 25 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Music - Music Education (Choral) Concentration, (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

## Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (89 hours)

Major Core (36 hours)

**Core Requirements** 

Completion of (16 hours):

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) or MUTC 3101 - Orchestration MUTC 3009 - Ear Training IV Credit Hours: (1)

## **Music History**

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

## Basic Conducting (2 hours):

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

```
MUAP 1105 - Class Piano I Credit Hours: (1)
MUAP 1106 - Class Piano II Credit Hours: (1)
MUAP 2107 - Class Piano III Credit Hours: (1)
```

#### Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

#### **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

#### Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Music Education (53 hours):

Core (32 hours):

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) MUSE 4901 - Residency I Credit Hours: (5) MUSE 4999 - Professional Seminar Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) MUSE 2002 - Foundations Music Ed Credit Hours: (2-3) Credits / Units: 2 MUAP 3999 - Junior Recital Credit Hours: (1) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) MUSE 4911 - Residency II Credit Hours: (9) Credits / Units: 9 MUSE 4213 - Mat/Method/Elementary Music Credit Hours: (3)

## Choral Emphasis (21 hours):

MUAP 1610 - Voice Intro Instr Credit Hours: (1) (Not required of students enrolled in applied voice)

MUAP 2108 - Class Piano IV Credit Hours: (1) MUSE 4211 - Vocal Diction I Credit Hours: (2) MUSE 4701 - Choral Conducting Credit Hours: (2-3)

#### Applied Music:

at least 2 hours at the upper division level (12)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music Education (Choral) Concentration Sequence

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH(3) *
MUTC 1008 - Music Theory | Credit Hours: (3)
MUTC 1010 - Ear Training | Credit Hours: (1)
MUAP 1105 - Class Piano I Credit Hours: (1)
MUAP (applied music) (2)
MUAP (large ensemble) (1)
MUID 1001 - Intro Music Technology Credit Hours: (1)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
MUSE 2002 - Foundations Music Ed Credit Hours: (2-3)
MUTC 1009 - Music Theory II Credit Hours: (3)
MUTC 1011 - Ear Training II Credit Hours: (1)
MUAP 1106 - Class Piano II Credit Hours: (1)
MUAP (applied music) (2)
MUAP (large ensemble) (1)
EDPR 2111 - Development Across Lifespan Credit Hours: (3)
```

#### Semester Totals 31 hrs

#### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
MUTC 2008 - Chromatic Harmony Credit Hours: (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
MUTC 2010 - Ear Training III Credit Hours: (1)
MUAP (applied music) (2)
MUAP (large ensemble) (1)
MUAP 2107 - Class Piano III Credit Hours: (1)
SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)
Natural Science (4) *
PSYC 1030 - General Psychology** Credit Hours: (3)
MUTC 3008 - Post-Tonal Music Credit Hours: (3)
MUTC 3009 - Ear Training IV Credit Hours: (1)
MUAP 2108 - Class Piano IV Credit Hours: (1)
MUAP (ensemble) (1)
MUAP (applied music) (2)
MUSE 3700 - Basic Conducting Credit Hours: (2)
```

### Semester Totals 34 hrs

Junior Year

MUSE 4213 - Mat/Method/Elementary Music Credit Hours: (3) History (3) \* MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUSE 4701 - Choral Conducting Credit Hours: (2-3) MUAP (applied music) (2) MUAP (small ensemble) (1) MUAP (large ensemble) (1) MUSE 4211 - Vocal Diction | Credit Hours: (2) Social/Behavioral Sciences (3) \* ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) MUSE 4405 - Matrl/Method Choral Mus 7-12 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3) MUAP (applied music) (2) MUAP (ensemble) (1) MUSE 4523 - Vocal Pedagogy Credit Hours: (2) MUAP 3999 - Junior Recital Credit Hours: (1)

### Semester Totals 34 hrs

## Senior Year

```
MUSE 4901 - Residency I Credit Hours: (5)
History (3) *
Natural Science (4) *
MUAP (large ensemble) (1)
MUSE 4999 - Professional Seminar Credit Hours: (3)
MUSE 4911 - Residency II Credit Hours: (9)
```

Semester Totals 25 hrs

## Total Hours: 124

## Total Hours Required for Graduation: 124

\*Must satisfy University General Education Program Requirement

## Music - Music Education (Instrumental) Concentration, (B.M.)

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

## Rudi E. Scheidt School of Music

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (90 hours)

Major Core (36 hours)

## Core Requirements

## Completion of (16 hours):

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) or MUTC 3101 - Orchestration MUTC 3009 - Ear Training IV Credit Hours: (1)

### **Music History**

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

Basic Conducting (2 hours):

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

```
MUAP 1105 - Class Piano I Credit Hours: (1)
MUAP 1106 - Class Piano II Credit Hours: (1)
MUAP 2107 - Class Piano III Credit Hours: (1)
```

## Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Music Education: (54 hours)

Core (32 hours):

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) MUSE 4901 - Residency I Credit Hours: (5) MUSE 4999 - Professional Seminar Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) MUSE 2002 - Foundations Music Ed Credit Hours: (2-3) MUAP 3999 - Junior Recital Credit Hours: (1) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) MUSE 4911 - Residency II Credit Hours: (9) MUSE 4213 - Mat/Method/Elementary Music Credit Hours: (3)

## Instrumental Emphasis (22 hours):

MUSE 1101 - Class Inst Brass Credit Hours: (1) MUSE 1103 - Class Inst Percussion Credit Hours: (1) MUSE 1104 - Class Inst Woodwinds Credit Hours: (1) MUSE 1116 - Class Instr Strings Credit Hours: (1) MUSE 4205 - Marching Band Technique Credit Hours: (1) MUSE 4403 - Material/Meth Inst Musc 9-12 Credit Hours: (3) Credits / Units: 3 MUSE 4700 - Instrumental Conducting Credit Hours: (2-3)

#### Applied Music:

at least 2 hours at the upper division level (12)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music Education (Instrumental) Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH(3) \*MUTC 1008 - Music Theory | Credit Hours: (3) MUTC 1010 - Ear Training | Credit Hours: (1) MUAP 1105 - Class Piano I Credit Hours: (1) MUAP (applied music) (2) MUAP (large ensemble) (1) MUID 1001 - Intro Music Technology Credit Hours: (1) MUSE 1104 - Class Inst Woodwinds Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MUSE 2002 - Foundations Music Ed Credit Hours: (2-3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1011 - Ear Training II Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP (applied music) (2) MUAP (large ensemble) (1) EDPR 2111 - Development Across Lifespan Credit Hours: (3) MUSE 1103 - Class Inst Percussion Credit Hours: (1)

#### Semester Totals 33 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUAP 2107 - Class Piano III Credit Hours: (1) MUAP (applied music) (2) MUAP (large ensemble) (1) MUSE 1116 - Class Instr Strings Credit Hours: (1) COMM 2381 - Oral Communication \*\* Credit Hours: (3) PSYC 1030 - General Psychology\*\* Credit Hours: (3) MUSE 3700 - Basic Conducting Credit Hours: (2) MUSE 1101 - Class Inst Brass Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1) MUAP (applied music) (2) MUAP (ensemble) (1) Natural Science (4) \*

#### Semester Totals 35 hrs

#### Junior Year

MUSE 4213 - Mat/Method/Elementary Music Credit Hours: (3) History (3) \* MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUSE 4700 - Instrumental Conducting Credit Hours: (2-3) MUAP (applied music) (2) MUAP (large ensemble) (1) MUSE 4205 - Marching Band Technique Credit Hours: (1) MUAP (ensemble) (1) Social/Behavioral Sciences (3) \* MUSE 4403 - Material/Meth Inst Musc 9-12 Credit Hours: (3) ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3) MUAP (ensemble) (1) MUAP (applied music) (2) MUAP 3999 - Junior Recital Credit Hours: (1)

#### Semester Totals 32 hrs

### Senior Year

MUSE 4901 - Residency I Credit Hours: (5) History (3) \* Natural Science (4) \* MUAP (large ensemble) (1) MUSE 4999 - Professional Seminar Credit Hours: (3) MUSE 4911 - Residency II Credit Hours: (9)

Semester Totals 25 hrs

## Total Hours: 125

## Total Hours Required for Graduation: 125

## **Music - Music History Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302.

## **Rudi E. Scheidt School of Music**

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (43 hours)

Completion of (16 hours)

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1)

Theory Elective (One From the Following):

MUTC 3101 - Orchestration Credit Hours: (3) MUTC 3102 - Analysis of Tonal Music Credit Hours: (3) MUTC 3109 - Advanced Analysis of Post-Tonal Music Credit Hours: (3) MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3) MUTC 3301 - Commercial Music Arranging Credit Hours: (3) MUTC 4205 - 16th Cent Counterpoint Credit Hours: (2) MUTC 4206 - 18th Cent Counterpoint Credit Hours: (2) MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3)

## **Music History**

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

## History Elective (One From the Following) (3 hours)

MUHL 4008 - The Symphony Credit Hours: (3) MUHL 4009 - Choral Literature I Credit Hours: (3) MUHL 4010 - Choral Literature II Credit Hours: (3) MUHL 4013 - Women and Music Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

MUHL 4406 - Music since 1900 Credit Hours: (3) MUHL 4407 - History of Opera Credit Hours: (3) MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

## Basic Conducting (2 hours)

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

MUAP 1105 - Class Piano I Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP 2107 - Class Piano III Credit Hours: (1) MUAP 2108 - Class Piano IV Credit Hours: (1)

## Intro to Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

## **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## **Concert Attendance:**

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (42 hours)

## Music History:

Individual instruction in applied music (10) MUHL 4259 - Studies in Bibliography Credit Hours: (3) Electives (11) Advanced Music History (9) Foreign Language: 6 semester hours in addition to requirements for admission (6) MUHL 4999 - Music History Senior Project Credit Hours: (3)

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

## Typical 4-Year Music History Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUAP 1105 - Class Piano I Credit Hours: (1) MUAP (applied music) (2) MUAP (small ensemble) (1) MUID 1001 - Intro Music Technology Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1011 - Ear Training II Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP (applied music) (2) MUAP (ensemble) (1)

Semester Totals 29 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) History (3) \* MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUAP (applied music) (2) MUAP (large ensemble) (1) MUAP 2107 - Class Piano III Credit Hours: (1) Foreign Language (3) MATH (3) \* MUAP 2108 - Class Piano IV Credit Hours: (1) History (3) \* MUAP (ensemble) (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1) MUAP (applied music) (2) Foreign Language (3)

## Semester Totals 34 hrs

## Junior Year

```
Natural Science (4) *

MUHL 3301 - History of Music to 1750 Credit Hours: (3)

MUAP (applied music) (2)

MUSE 3700 - Basic Conducting Credit Hours: (2)

MUAP (ensemble) (1)

COMM 2381 - Oral Communication ** Credit Hours: (3)

Natural Sciences (4) *

Concentration elective (3)

MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

Concentration elective (2)

MUAP (ensemble) (1)

MUHL elective (3) ***
```

## Semester Totals 31 hrs

## Senior Year

Concentration Elective (2) MUHL elective (3) MUHL elective (3) MUHL 4259 - Studies in Bibliography Credit Hours: (3) MUAP (ensemble) (1) MUHL 4999 - Music History Senior Project Credit Hours: (3) MUHL elective (3) \*\*\* MUAP (ensemble) (1) Concentration elective (2) Concentration elective (2) MUTC elective (3)

Semester Totals 26 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Choose one from MUTC 3101, MUTC 3102, MUTC 3109, MUTC 3201, MUTC 3301, MUTC 4205, MUTC 4206, MUTC 4210

\*\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## **Music - Performance Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3301 and MUHL 3302 for Music Performance Majors.

## **Rudi E. Scheidt School of Music**

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (85 hours)

Major Core (43 hours)

Completion of (16 hours)

MUTC 1008 - Music Theory I Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1010 - Ear Training I Credit Hours: (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUTC 2008 - Chromatic Harmony Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1) MUTC 3008 - Post-Tonal Music Credit Hours: (3) MUTC 3009 - Ear Training IV Credit Hours: (1)

#### Theory Elective (One From the Following)

- MUTC 3101 Orchestration Credit Hours: (3)
- MUTC 3102 Analysis of Tonal Music Credit Hours: (3)
- MUTC 3109 Advanced Analysis of Post-Tonal Music Credit Hours: (3)
- MUTC 3201 Jazz/Comm Arr/Orchestration Credit Hours: (3)
- MUTC 4205 16th Cent Counterpoint Credit Hours: (2)
- MUTC 4206 18th Cent Counterpoint Credit Hours: (2)
- MUTC 4210 Music Theory: Popular Styles Credit Hours: (3)
  - Note: Brass Performance majors can take MUTC 3825 MAT/TECH IMPROV I.

#### Music History

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3)

#### History Elective (One From the Following) (3 hours)

MUHL 4008 - The Symphony Credit Hours: (3)

- MUHL 4009 Choral Literature I Credit Hours: (3)
- MUHL 4010 Choral Literature II Credit Hours: (3)
- MUHL 4013 Women and Music Credit Hours: (3)
- MUHL 4406 Music since 1900 Credit Hours: (3)
- MUHL 4407 History of Opera Credit Hours: (3)
- MUHL 4800 World Musical Styles Credit Hours: (3)
- MUHL 4801 American Folk/Popular Music Credit Hours: (3)
- MUHL 4805 History of Rock and Roll Credit Hours: (3)
- MUHL 4806 History of Jazz Credit Hours: (3)
- MUHL 4807 Memphis Music Credit Hours: (3)

#### Basic Conducting (2 hours)

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

#### Piano

- MUAP 1105 Class Piano I Credit Hours: (1)
- MUAP 1106 Class Piano II Credit Hours: (1)
- MUAP 2107 Class Piano III Credit Hours: (1)
- MUAP 2108 Class Piano IV Credit Hours: (1)

```
With one Exceptions:
```

Piano Performance majors take MUSE 3101, MUAP 1320, MUAP 1330. All undergraduate Music majors, irrespective of concentration must take a piano placement examination before enrolling in the School of Music. This evaluation will place students in the appropriate course in the class-piano sequence. All piano proficiency requirements as appropriate to the concentration must be passed before graduation.

820 Students already proficient in piano may be permitted to bypass the class-piano sequence and enroll in MUSE 3101, which will satisfy this requirement and any student may choose to take the departmental Piano Proficiency Examination in lieu of coursework. Since the requirements for this exam vary according to the area of concentration, contact the Coordinator of Class Piano for specific details.

## Ensemble Requirement:

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

## Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

## Concentration (42 hours)

## Performance

Instruction in performance leading to the Bachelor of Music in Music with a concentration in Performance is provided for the following areas: Trumpet, Horn, Trombone, Tuba, and Euphonium (Brass Instruments); Piano, Harpsichord, and Organ (Keyboard Instruments); Percussion; Violin, Viola, Violoncello, Bass, Guitar, and Harp (String Instruments), Flute, Oboe, Clarinet, Saxophone, and Bassoon (Woodwind Instruments); Voice.

## Individual Instruction in Major Performance Area (24 hours)

Instruction in Secondary Performance Area, Repertory, and/or Pedagogy (7 hours):

#### For Brass Instruments:

MUHL 4020 - Solo Brass Literature Credit Hours: (3) MUSE 4514 - Brass Pedagogy Credit Hours: (3) MUAP 4004 - Orchestral Excerpts Credit Hours: (1)

#### For Woodwind Instruments:

MUSE 4521 - Woodwind Pedagogy Credit Hours: (3) MUAP 4004 - Orchestral Excerpts Credit Hours: (1) MUAP 4263 - Reed Making Credit Hours: (1)

#### Flute and Saxophone Players Should Take

MUAP 3701 - Woodwind Ensemble Credit Hours: (1) instead of reed making

#### **Clarinet Players Take**

MUAP 3701 - Woodwind Ensemble Credit Hours: (1) or an additional MUAP 4004 - Orchestral Excerpts Credit Hours: (1) instead of Reed Making

#### For Percussion:

MUHL 4030 - Percussion Repertory Credit Hours: (3) MUSE 4520 - Percussion Pedagogy Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## For Bowed Strings:

6 hours chosen from

MUHL 4500 - String Repertory Credit Hours: (3) MUAP 4004 - Orchestral Excerpts Credit Hours: (1) MUHL 4008 - The Symphony Credit Hours: (3) MUHL 4022 - Early Chamber Music Credit Hours: (3) MUHL 4011 - String Quartet Literature Credit Hours: (3) MUSE 4506 - Suzuki String Pedagogy | Credit Hours: (3) and/or up to 2 hours of an approved secondary string instrument

#### For Guitar:

MUHL 4015 - Guitar Literature Credit Hours: (3)	
MUSE 4251 - Guitar Pedagogy Credit Hours: (3	)

For Voice:

MUSE 4523 - Vocal Pedagogy Credit Hours: (2) MUHL 4002 - Song Repertory | Credit Hours: (2) MUHL 4003 - Song Repertory || Credit Hours: (2)

For Piano:

```
MUHL 4001 - Piano Repertory Credit Hours: (2)
MUSE 4501 - Piano Pedagogy I Credit Hours: (2)
MUSE 4505 - Collab Piano Technique Credit Hours: (2)
```

Junior Recital (1 hour)

```
Artist Recital (4 hours)
```

```
MUAP 4999 - Artist Recital Credit Hours: (4)
```

## Small Ensembles (2-6 hours)

Four semesters of small ensembles, chosen from those listed under "Small Ensembles and Chamber Music" in consultation with the major advisor, is required. Piano performance students must take a minimum of four (4) semesters of MUAP 3301, Chamber Music for Keyboard, as part of the music core requirements for ensembles.

For students in voice, MUSE 4211 - Vocal Diction I, MUSE 4212 - Vocal Diction II, and a demonstrated proficiency equivalent to the first semester university level courses in French, German, and Italian.

For Piano performance students, the following is to be taken in lieu of the four hours of class piano: Functional Keyboard Skills (1).

MUSE 3101 - Functional Keyboard Skills Credit Hours: (2) MUAP 1330 - Organ Intro Instruction Credit Hours: (1) MUAP 1320 - Harpsichord Intro Instr Credit Hours: (1)

#### **Music Electives**

As needed to satisfy 120 hour degree requirement.

## Electives (0 - 12 hours)

Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

822

## Typical 4-Year Performance Concentration Sequence

## Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Social/Behavioral Sciences (3) *
MUTC 1008 - Music Theory I Credit Hours: (3)
MUTC 1010 - Ear Training I Credit Hours: (1)
MUAP 1105 - Class Piano I Credit Hours: (1)
MUAP (applied music) (3)
MUAP (large ensemble) (1)
MUID 1001 - Intro Music Technology Credit Hours: (1)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Social/Behavioral Sciences (3) *
MUTC 1009 - Music Theory II Credit Hours: (3)
MUTC 1011 - Ear Training II Credit Hours: (1)
MUAP 1106 - Class Piano II Credit Hours: (1)
MUAP (applied music) (3)
MUAP (large ensemble) (1)
```

## Semester Totals 31 hrs

## Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
MUTC 2008 - Chromatic Harmony Credit Hours: (3)
MUTC 2010 - Ear Training III Credit Hours: (1)
MUAP (applied music) (3)
MUAP 2107 - Class Piano III Credit Hours: (1)
MUAP (ensemble) (1)
MUAP (small ensemble) (1)
History (3) *
Small ensemble (1)
MATH (3) *
History (3) *
MUTC 3008 - Post-Tonal Music Credit Hours: (3)
MUTC 3009 - Ear Training IV Credit Hours: (1)
MUAP 2108 - Class Piano IV Credit Hours: (1)
MUAP (applied music) (3)
MUAP (ensemble) (1)
```

## Semester Totals 32 hrs

## Junior Year

```
Natural Science (4) *
Small ensemble (1)
MUHL 3301 - History of Music to 1750 Credit Hours: (3)
MUAP (ensemble) (1)
COMM 2381 - Oral Communication ** Credit Hours: (3)
The online catalog can be accessed at: http://catalog.memphis.edu/index.php
```

MUAP (applied music) (4) Natural Science (4) \* MUTC (3) \*\* MUHL 3302 - History of Music Since 1750 Credit Hours: (3) MUAP (applied music) (4) MUAP (ensemble) (1) MUAP 3999 - Junior Recital Credit Hours: (1)

#### Semester Totals 32 hrs

## Senior Year

MUHL Elective (3) Music Elective (3) MUAP (ensemble) (1) MUSE 3700 - Basic Conducting Credit Hours: (2) MUAP (applied music) (4) MUAP 4999 - Artist Recital Credit Hours: (4) Music Elective (3) Music Elective (3) UD elective (3) MUAP (ensemble) (1) MUAP (small ensemble) (1)

### Semester Totals 25 hrs

## Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Choose one from MUTC 3101, MUTC 3102, MUTC 3109, MUTC 3201, MUTC 3301, MUTC 4205, MUTC 4206, MUTC 4210

\*\*\*Choose one from MUHL 4008, MUHL 4009, MUHL 4010, MUHL 4013, MUHL 4406, MUHL 4407, MUHL 4800, MUHL 4801, MUHL 4805, MUHL 4806, MUHL 4807

## **Music Industry - Music Business Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 48xx. Note the following B.M. degree with a major in Music Industry program specifications: (1) Music Business must complete ECON 2010 and ECON 2020 to fulfill the Social/Behavioral Sciences requirement; (2) for the mathematics requirement, Music Business must complete MATH 1530 and Recording Technology must complete MATH 1830; (3) PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 (Natural Science requirement) is recommended for the Recording Technology concentration. The Humanities category is satisfied for students who meet all B.M. requirements.

## Admission Information for the Rudi E. Scheidt School of Music

The Music Industry degree is a Bachelors of Music degree; therefore, it requires an audition before any student can be admitted to any Rudi E. Scheidt School of Music program. Audition information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## Major Core (29 hours)

MUTC 1002 - Musicianship I Credit Hours: (5) MUTC 2002 - Musicianship II Credit Hours: (5) MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3) MUAP xxxx (ensembles) (2) MUAP 1116 - Jazz Class Piano Credit Hours: (1) 1xxx (applied instruction) (4) MUID 3103 - Contmp Songwrt/Prod Technique Credit Hours: (3)

## Choose One:

MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4804 - Blues Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

## Concert/Recital Attendance

Students must attend 50 concerts/recitals prior to graduation.

## Music Business Concentration (56 hours)

```
ACCT 2010 - Fundamentals of Acct I ** Credit Hours: (3)
FIR 1220 - Personal Financial Management Credit Hours: (3)
PBRL 3400 - Intro to Public Relations Credit Hours: (3)
    Or
PBRL 4431 - Music Promo/Public Relations Credit Hours: (3)
JRSM 3900 - Visual Media ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
MUID 1001 - Intro Music Technology Credit Hours: (1)
MUID 2201 - Intro to Music Industry Credit Hours: (2)
MUID 3105 - Music Marketing & Management Credit Hours: (3)
MUID 3506 - Music Distribution Credit Hours: (3)
MUID 4301 - Legal Aspcts Live Ent Industry Credit Hours: (3)
MUID 4604 - Legal Aspects Music Industry Credit Hours: (3)
MUID 4825 - Concerts and Touring Credit Hours: (3)
MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3)
MUID 4850 - Record Company Operations | Credit Hours: (3)
MUID 4851 - Record Company Operations II Credit Hours: (4)
MUID 4898 - Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)
MUID 4899 - Internship Credit Hours: (1-3)
```

## Electives (0 - 3 hours)

Elective courses may be chosen to bring the total number of hours to 120.

## Typical 4-Year Music Business Concentration Sequence

## **Freshman Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Natural Science (4) \* MUTC 1008 - Music Theory I Credit Hours: (3) Applied music (1) MUTC 1010 - Ear Training I Credit Hours: (1) MUAP 1105 - Class Piano I Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MUTC 1009 - Music Theory II Credit Hours: (3) Natural Science (4) \* MUAP 1116 - Jazz Class Piano Credit Hours: (1)

MUID 2201 - Intro to Music Industry Credit Hours: (2) MUAP (applied music) (1) MUTC 1011 - Ear Training II Credit Hours: (1) MUID 1001 - Intro Music Technology Credit Hours: (1)

## Semester Totals 32 hrs

## Sophomore Year

MUTC 2008 - Chromatic Harmony Credit Hours: (3) or MUTC 4210 - Music Theory: Popular Styles History (3) \* ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MUAP (applied music) (1) MUAP Ensemble (1) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) MUTC 2010 - Ear Training III Credit Hours: (1)

COMM 2381 - Oral Communication \*\* Credit Hours: (3) History (3) \* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* MUAP (applied music) (1) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) Ensemble (1)

#### Semester Totals 29 hrs

## Junior Year

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MUID 3506 - Music Distribution Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3) MUID 4301 - Legal Aspects Live Ent Industry Credit Hours: (3) MUID 4604 - Legal Aspects Music Industry Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MUID 3105 - Music Marketing & Management Credit Hours: (3) MUID 3103 - Contmp Songwrt/Prod Technique Credit Hours: (3) MUID 4825 - Concerts and Touring Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3)

#### Semester Totals 30 hrs

## Senior Year

MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3) MUID 4850 - Record Company Operations I Credit Hours: (3) FIR 1220 - Personal Financial Management Credit Hours: (3) MUID 4899 - Internship Credit Hours: (1-3) JRSM 3900 - Visual Media \*\* Credit Hours: (3)

MUID 4851 - Record Company Operations II **Credit Hours:** (4) MGMT 3510 - Business Communications \*\* **Credit Hours:** (3) MUID 4898 - Sr Proj Music Bus/Rec Technlgy **Credit Hours:** (4) MUHL (3) \*\*

Semester Totals 29 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Choose one: MUHL 4801, MUHL 4804, MUHL 4805, MUHL 4806, MUHL 4807

## **Music Industry - Recording Technology Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and MUHL 48xx. Note the following B.M. degree with a major in Music Industry program specifications: (1) Music Business must complete ECON 2010 and ECON 2020 to fulfill the Social/Behavioral Sciences requirement; (2) for the mathematics requirement, Music Business must complete MATH 1530 and Recording Technology must complete MATH 1830; (3) PHYS 2110/PHYS 2111 and PHYS 2120/PHYS 2121 (Natural Science requirement) is recommended for the Recording Technology concentration. The Humanities category is satisfied for students who meet all B.M. requirements.

## Admission Information for the Rudi E. Scheidt School of Music

The Music Industry degree is a Bachelors of Music degree; therefore, it requires an audition before any student can be admitted to any Rudi E. Scheidt School of Music program. Audition information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

## The Major (85 hours)

## Major Core (29 hours)

MUTC 1002 - Musicianship I Credit Hours: (5) MUTC 2002 - Musicianship II Credit Hours: (5) MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3) MUAP xxxx (ensembles) (2) MUAP 1116 - Jazz Class Piano Credit Hours: (1) 1xxx (applied instruction) (4) MUID 3103 - Contmp Songwrt/Prod Technique Credit Hours: (3)

### Choose One:

MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4804 - Blues Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

## Concert/Recital Attendance

Students must attend 50 concerts/recitals prior to graduation.

## Recording Technology Concentration (56 hours)

MUID 2201 - Intro to Music Industry Credit Hours: (2) MUID 3800 - Recording Studio Technology Credit Hours: (3) MUID 3801 - Digital Data Structures Credit Hours: (2) MUID 3901 - Critical Listening | Credit Hours: (1) MUID 3902 - Critical Listening II Credit Hours: (1) MUID 3903 - Critical Listening III Credit Hours: (1) MUID 3905 - Digital Audio Workstations Credit Hours: (3) MUID 4604 - Legal Aspects Music Industry Credit Hours: (3) MUID 4800 - Basic Recording Credit Hours: (4) MUID 4802 - Advanced Recording Credit Hours: (3) MUID 4803 - Adv Mix/Master Audio Credit Hours: (3) MUID 4811 - Studio Maintenance Practicum Credit Hours: (1-3) MUID 4822 - Applied Lessons in Recording Credit Hours: (1) MUID 4830 - Trends Business Pract/Tech Credit Hours: (3) MUID 4833 - Applied Lessons in Mixing Credit Hours: (1) MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3) MUID 4850 - Record Company Operations | Credit Hours: (3) MUID 4898 - Sr Proj Music Bus/Rec Technlgy Credit Hours: (4) MUID 4899 - Internship Credit Hours: (1-3) TECH 1811 - Electronic Circuit Technology Credit Hours: (3) TECH 2821 - Solid State Technology Credit Hours: (3)

## Recording Technology Elective Path (6 hours)

Students are to complete the elective hours in one academic area. Electives are to be chosen from an approved list of classes, which is available from the student's advisor.

## Electives (0 - 3 hours)

Elective courses may be chosen to bring the total number of hours to 120.

## Typical 4-Year Recording Technology Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) MUTC 1008 - Music Theory I Credit Hours: (3) MUAP 1105 - Class Piano I Credit Hours: (1) MUAP (applied music) (1)

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
MUID 2201 - Intro to Music Industry Credit Hours: (2)
Social/Behavioral Sciences (3) *
MUAP 1116 - Jazz Class Piano Credit Hours: (1)
MUTC 1009 - Music Theory II Credit Hours: (3)
MUTC 1011 - Ear Training II Credit Hours: (1)
MUAP (applied music) (1)
TECH 1811 - Electronic Circuit Technology Credit Hours: (3)
```

### Semester Totals 32 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* MUTC 2008 - Chromatic Harmony Credit Hours: (3) or MUTC 4210 - Music Theory: Popular Styles MUTC 2010 - Ear Training III Credit Hours: (1) TECH 2821 - Solid State Technology Credit Hours: (3) MUAP (applied music) (1) MUID 3901 - Critical Listening I Credit Hours: (1) MUID 3800 - Recording Studio Technology Credit Hours: (3) Music ensemble (1)

MUID 3801 - Digital Data Structures **Credit Hours:** (2) MUID 3902 - Critical Listening II **Credit Hours:** (1) MUID 3905 - Digital Audio Workstations **Credit Hours:** (3) MUID 4800 - Basic Recording **Credit Hours:** (4) Music Ensemble (1) MUAP (applied music) (1)

## Semester Totals 28 hrs

## Junior Year

Natural Science (4) \* Elective (3) MUID 3903 - Critical Listening III Credit Hours: (1) MUID 4604 - Legal Aspects Music Industry Credit Hours: (3) MUID 4802 - Advanced Recording Credit Hours: (3) MUID 4811 - Studio Maintenance Practicum Credit Hours: (1-3) MUID 4822 - Applied Lessons in Recording Credit Hours: (1) Elective (3) Natural Science (4)

MUID 4833 - Applied Lessons in Mixing **Credit Hours:** (1) MUID 4803 - Adv Mix/Master Audio **Credit Hours:** (3) MUID 3103 - Contmp Songwrt/Prod Technique **Credit Hours:** (3) MUID 4899 - Internship **Credit Hours:** (1-3)

#### Semester Totals 31 hrs

## Senior Year

History (3) \* MUHL (3) \*\* MUID 4830 - Trends Business Pract/Tech Credit Hours: (3) MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3) MUID 4850 - Record Company Operations I Credit Hours: (3)

History (3)\* COMM 2381 - Oral Communication \*\* Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3) MUID 4898 - Sr Proj Music Bus/Rec Technlgy Credit Hours: (4)

Semester Totals 29 hrs

Total Hours: 120

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Choose one: MUHL 4801, MUHL 4804, MUHL 4805, MUHL 4806, MUHL 4807

# **Music-Commercial Music Performance Concentration, (B.M.)**

# University General Education Program (35 hours in addition to 6 hours of Music History)

See Graduation from the University for the University General Education Program requirements. Six hours of Humanities are satisfied by taking MUHL 3303 and any 4000 level elective.

# **Rudi E. Scheidt School of Music**

Admission to the Rudi E. Scheidt School of Music requires an audition. This information can be found on the Rudi E. Scheidt School of Music website under Audition Information.

The Major (79 hours)

Major Core (38 hours)

Completion of (15 hours)

```
MUTC 1008 - Music Theory I Credit Hours: (3)

MUTC 1009 - Music Theory II Credit Hours: (3)

MUTC 1010 - Ear Training I Credit Hours: (1)

MUTC 1011 - Ear Training II Credit Hours: (1)

MUTC 2008 - Chromatic Harmony Credit Hours: (3)

or

MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3)

MUTC 2010 - Ear Training III Credit Hours: (1)
```

### **Music History**

MUHL 3303 - Western Music History Credit Hours: (3) Any MUHL 4000 level course MUHL 4800 - World Musical Styles Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3)

### Basic Conducting (2 hours)

MUSE 3700 - Basic Conducting Credit Hours: (2)

#### Piano

MUAP 1105 - Class Piano I Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP 1116 - Jazz Class Piano Credit Hours: (1)

### Intro Music Technology

MUID 1001 - Intro Music Technology Credit Hours: (1)

### **Ensemble Requirement:**

All Music majors must take a minimum of eight (8) semesters of ensemble. The specific requirements for this are determined by each division and degree program. Please consult with your adviser for the specific outline for your applied area and degree program exceptions. Music Education Instrumental students must take two semesters of Marching Band (string players exempt) and one semester of University Singers, Chamber Choir, or Collegiate Choir as part of their ensemble requirement.

### Concert Attendance:

All Music majors are required to attend a minimum of 100 concerts or recitals in the four-year program (suggested 25 per year). Records will be maintained in by the School of Music on the number of events attended by each student and an annual report will be filed with the Director.

# Concentration (47 hours)

### **Commercial Music Performance**

MUAP 1XX1 (1) MUAP 1XX2 (10) MUAP 4XX2 (4) MUAP 3103 - Commercial Music Combo Credit Hours: (1) (6) MUAP 4895 - Sr Proj Jazz/Studio Perform Credit Hours: (3) MUID 2201 - Intro to Music Industry Credit Hours: (2) MUID 3103 - Contmp Songwrt/Prod Technique Credit Hours: (3) MUTC 3201 - Jazz/Comm Arr/Orchestration Credit Hours: (3) MUID 3905 - Digital Audio Workstations Credit Hours: (3) MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3) MUTC 3301 - Commercial Music Arranging Credit Hours: (3) MUTC 3825 - Material/Techniques Improv I Credit Hours: (3)

### Electives (0 - 12 hours)

831 Completion of elective courses to bring the total to a minimum of 120 semester hours (124 or 125 for students in the Music Education concentration depending on emphasis). Courses will be chosen by the student in consultation with the advisor and major professor.

# Typical 4-Year Commercial Music Performance Concentration Sequence

# Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* MUTC 1008 - Music Theory | Credit Hours: (3) MUTC 1010 - Ear Training | Credit Hours: (1) MUAP 1105 - Class Piano | Credit Hours: (1) MUID 1001 - Intro Music Technology Credit Hours: (1) MUAP (applied music) (2) MUAP 3103 - Commercial Music Combo Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social/Behavioral Sciences (3) \* MUTC 1009 - Music Theory II Credit Hours: (3) MUTC 1011 - Ear Training II Credit Hours: (1) MUAP 1106 - Class Piano II Credit Hours: (1) MUAP 1116 - Jazz Class Piano Credit Hours: (1) MUAP (applied music) (2) MUAP 3103 - Commercial Music Combo (1)

### Semester Totals 30 hrs

### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
MUTC 2008 - Chromatic Harmony Credit Hours: (3)
    or
MUTC 4210 - Music Theory: Popular Styles Credit Hours: (3)
MUTC 2010 - Ear Training III Credit Hours: (1)
MUTC 2103 - Theory Jazz/Pop/Commercial | Credit Hours: (3)
MUAP (ensemble) (1)
MUID 2201 - Intro to Music Industry Credit Hours: (2)
MUAP (applied music) (2)
MUAP 3103 - Commercial Music Combo Credit Hours: (1)
MATH(3) *
History (3) *
MUTC 3301 - Commercial Music Arranging Credit Hours: (3)
MUID 3103 - Contmp Songwrt/Prod Technique Credit Hours: (3)
MUAP (ensemble) (1)
MUAP (applied music) (2)
MUAP 3103 - Commercial Music Combo (1)
```

### Semester Totals 32 hrs

### Junior Year

Natural Science (4) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3) MUSE 3700 - Basic Conducting **Credit Hours:** (2) MUTC 3825 - Material/Techniques Improv I **Credit Hours:** (3) MUAP (ensemble) (1) MUAP (applied music) (2) MUAP 3103 - Commercial Music Combo **Credit Hours:** (1) Natural Science (4) \* History (3) \* MUHL 3303 - Western Music History **Credit Hours:** (3) MUID 3905 - Digital Audio Workstations **Credit Hours:** (3) MUAP (ensemble) (1) MUAP (applied music) (1) MUAP 3103 - Commercial Music Combo (1)

### Semester Totals 32 hrs

# Senior Year

```
Music Elective (3)

MUHL Elective (3)

MUID 4840 - Entrepreneurship Comm Music Credit Hours: (3)

MUAP (ensemble) (1)

MUAP (applied music) (2)

MUAP 3103 - Commercial Music Combo Credit Hours: (1)

Elective (3)

MUAP 4895 - Sr Proj Jazz/Studio Perform Credit Hours: (3)

MUHL Elective (3)

MUAP (ensemble) (1)

MUAP (applied music) (2)

MUAP 3103 - Commercial Music Combo (1)
```

### Semester Totals 26 hrs

# Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Music Minor**

# Requirements

Students wishing to declare a minor in music must first apply to the School of Music and audition on their instrument (or voice) for acceptance. Music minor applicants also take a music theory assessment to determine proper music theory placement. The minor in Music consists of 21 credit hours and is available to any student who completes the following requirements:

Applied Music Individual Instruction (4 hours)

# 2 Semesters Appropriate Ensembles (2 hours)

# Music Theory (6 hours)

MUTC 1008 - Music Theory | Credit Hours: (3)

#### Choose One From (3 hours)

MUHL 3301 - History of Music to 1750 Credit Hours: (3) MUHL 3302 - History of Music Since 1750 Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3)

### Upper Division Electives (6 hours)

### In Addition

All music minors are required to attend a minimum of 25 concerts or recitals.

# **Theatre and Dance**

The Bachelor of Fine Arts degree is a program specifically designed for students whose certain interests and abilities strongly suggest the potential for pursuing careers as artists in the resident, professional, community, or academic theatre.

To expand the student's creative powers and deepen the commitment to a vocation in the theatre, the B.F.A. program offers the student (1) a basic probing of all the arts and crafts of the theatre and dance; (2) an exploration in depth of one area of special interest; (3) the opportunity to participate creatively as a theatre or dance artist through extensive production experience.

Five concentrations are offered: (1) Performance, (2) Musical Theatre, (3) Dance, (4) Dance Science, (5) Design and Technical Production. Students entering the B.F.A. program will elect one of these four concentrations. The University of Memphis is an accredited institutional member of the National Association of Schools of Theatre (NAST).

Admission and Retention Criteria: Admission to the concentration in Performance or Musical Theatre is by audition. Admission to the concentration in Dance and Dance Science is by application only. Admission to the concentration in Design and Technical Production is by interview. Admission to the concentration in Performance with an emphasis in dance is by application only. To remain in good standing as a major in Theatre and Dance, the student must be evaluated through the evaluation and interview, or portfolio and interview, or portfolio and interview, applicants will be notified as to whether they have been accepted into the program, accepted for one more semester on a probationary basis, or advised to pursue another degree.

- Performance: Retention in the Performance concentration is based on a required annual examination and interview. In addition to the interview, the student is expected to present an audition package consisting of two contrasting monologues from plays of distinctly different styles or periods, and depending on the student's preference, 16-32 bars of a song. The duration of material to be presented willl vary based on the student's standing in the program and is at the discretion of the faculty.
- Musical Theatre: Retention in the Musical Theatre concentration is based on a required annual examination and interview. In addition to the interview, the student is expected to present an audition package consisting of monologues from plays, songs from the musical theatre canon, and a demonstration of dance styles specific to the genre. The duration of material to be presented will vary based on the student's standing in the program and is at the discretion of the faculty.

Dance: Retention is based on recommendation of dance faculty.

- Dance Science: Retention is based on recommendation of dance and ESMS faculty.
- Design and Technical Production: Retention in the Design and Technical Production concentration is based on an annual required portfolio review and interview. In addition to the interview, the student is expected to present a portfolio of artistic and production work. This may consist of items including photographs, sketches, costume plates, elevations, lighting plots, ground plans, and audio designs.

The fact must be emphasized that admission to the B.F.A curriculum does not imply a student's permanent tenure in the program. Beyond the audition interview or portfolio review, the student's active participation in the co-curricular activities of the department will be assessed by the theatre and dance faculty. Artistic growth, development of technical facility, and continuing commitment to creative excellence on the part of the student will be evaluated. Permission to continue in the program will be based on this evaluation.

Former B.F.A. students who have left the program for a fall or spring term must apply for readmission to the department. A new audition or interview may be required at the discretion of the faculty. The readmission process is not required if the absence is approved by the area coordinator and the department chair in advance.

Internship (THEA 4541 or ESMS 4541): The intent of this requirement and course is to provide the student experience in a full-time theatre or dance related production situation. Off-campus participation (usually following the junior year) is an essential element of the B.F.A. program. Details are to be planned in advance in conference with the student's advisor.

834

**Transfer of Credit:** In certain cases students may be admitted to an advanced level of the B.F.A. program. Such admission will be based upon a departmental advisor's evaluation of previous course work and theatre experience. Even if admitted to an advanced standing, the student will be required to remedy previous course deficiencies.

Advising: Upon application to the B.F.A. program, each student will be assigned a faculty advisor. For this degree, 120 semester hours are required for graduation. A minimum grade of "C-" is required in all departmental courses applicable to the major. The student must maintain an overall grade point average of 2.0. A 2.0 cumulative GPA is required for all courses completed in the major.

# Theatre - Dance Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

# The Major (79 hours)

# Major Core (12 hours)

Choose two (2) design/tech courses from the following:

THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 -Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 -Stage Management Skills Required Courses (6 hours)

THEA 3412 - Directing Experiments Credit Hours: (3)

THEA 4541 - Internship Credit Hours: (1-3)

### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

# Concentration (67 hours)

### Dance (50 hours)

THEA 3601-THEA 3609 (2) Theatre labs. DANC 2101 - Dance Improvisation **Credit Hours:** (3) DANC 2825 - Intermediate Ballet **Credit Hours:** (3) (12) DANC 3101 - History of Dance **Credit Hours:** (3) DANC 3201 - Dance Movement Analysis **Credit Hours:** (3) DANC 3829 - Advanced Contemporary Dance **Credit Hours:** (3) (12) DANC 4101 - Dance Repertory **Credit Hours:** (3) DANC 4201 - Dance Composition | **Credit Hours:** (3) DANC 4202 - Dance Composition | **Credit Hours:** (3) DANC 4402 - Dance Ed/Diverse Setting **Credit Hours:** (3) DANC 4404 - Dance Teaching Methods **Credit Hours:** (3) Dance and Theatre electives are DANC and THEA classes (12 hours).

### Free Electives (5 hours)

The free electives can be non-departmental courses as well as Dance and Theatre courses. Courses should be approved by the student's advisor.

# Typical 4-Year Dance Concentration Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
Social Science (3) \*
DANC 1151 - Introduction to Dance Credit Hours: (3)
DANC Elective (3)
THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills
THEA 3601-THEA 3609 (1)
THEA 3412 - Directing Experiments Credit Hours: (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Social Science (3) \* DANC Elective (3) MUS 1030 - Introduction to Music\*\* Credit Hours: (3)

### Semester Totals 32 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*
DANC 2101 - Dance Improvisation Credit Hours: (3)
DANC 4201 - Dance Composition I Credit Hours: (3)
Dance Elective
Dance Elective
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
History (3) \*
Math (3) \*
THEA 2511 - Intro Theatre Production Credit Hours: (3) , THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
DANC 4202 - Dance Composition II Credit Hours: (3)

#### Semester Totals 30 hrs

### Junior Year

DANC 2825 - Intermediate Ballet Credit Hours: (3) DANC 3101 - History of Dance Credit Hours: (3) DANC 3829 - Advanced Contemporary Dance Credit Hours: (3) DANC 4101 - Dance Repertory Credit Hours: (3) DANC Elective DANC 4402 - Dance Ed/Diverse Setting Credit Hours: (3) Natural Science (4)\* DANC 2825 - Intermediate Ballet DANC 3829 - Advanced Contemporary Dance

#### Semester Totals 28 hrs

#### Senior Year

History (3) \* DANC 2825 - Intermediate Ballet Credit Hours: (3) DANC 3201 - Dance Movement Analysis Credit Hours: (3) DANC 3829 - Advanced Contemporary Dance Credit Hours: (3) THEA 4541 - Internship Credit Hours: (1-3)

DANC 4404 - Dance Teaching Methods Credit Hours: (3) Natural Science (4) \* Elective (2) DANC 2825 - Intermediate Ballet DANC 3829 - Advanced Contemporary Dance

#### Semester Totals 30 hrs

### Total Hours: 120

### Total Hours required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Theatre - Dance Science Concentration, (B.F.A)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

### The Major (79 hours)

### Major Core (12 hours)

Choose two (2) Design/Tech courses from the following: THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft Credit Hours: (3) THEA 3515 - Costume Construction Credit Hours: (3) THEA 3561 - Principles Scene Design Credit Hours: (3) THEA 3562 - Principles Costume Dsgn Credit Hours: (3) THEA 3563 - Principles of Light & Sound Design Credit Hours: (3) THEA 3620 - Stage Management Skills Credit Hours: (3)

6 semester hours required from: THEA 3412 - Directing Experiments Credit Hours: (3) THEA 4541 - Internship Credit Hours: (1-3) or ESMS 4605 - Internship

#### Note:

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in

## Concentration (67 hours)

### Dance Science (36 hours)

DANC 1000 - Introduction to Dance Science Credit Hours: (3)

Ballet (9 hours) DANC 1825 - Beginning Ballet Credit Hours: (3) or DANC 2825 - Intermediate Ballet or DANC 3825 - Advanced Ballet

Contemporary Dance (9 hours) DANC 1821 - Beginning Contemporary Dance Credit Hours: (3) or DANC 2821 - Intermediate Contemporary Dance or DANC 3829 - Advanced Contemporary Dance

DANC 3201 - Dance Movement Analysis Credit Hours: (3) ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) ESMS 3020 - Exercise and Sport Mechanics Credit Hours: (3) ESMS 3050 - Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3) ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3)

### Dance (12 Upper Division hours)

DANC 3101 - History of Dance **Credit Hours:** (3) DANC 4202 - Dance Composition II **Credit Hours:** (3) DANC 4402 - Dance Ed/Diverse Setting **Credit Hours:** (3) DANC 4404 - Dance Teaching Methods **Credit Hours:** (3)

Exercise Movement (9 Upper Division hours)

ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) ESMS 3853 - Motor Behavior Credit Hours: (3) ESMS 4000 - Exercise Testing Interpretation Lab Credit Hours: (3)

### Remaining Courses (10 hours)

The remaining courses can be non-departmental courses as well as Theatre and Dance courses. Courses should be approved by the student's advisor.

# Typical 4-Year Dance Science Concentration Sequence

### **Freshmen Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3) BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) DANC 1151 - Introduction to Dance Credit Hours: (3) DANC 1000 - Introduction to Dance Science Credit Hours: (3)

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
THEA 3412 - Directing Experiments Credit Hours: (3)
Dance (Ballet) (3)
Elective (3)
```

#### Semester Totals 32 hours

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* History (3)\*
ESMS 3020 - Exercise and Sport Mechanics Credit Hours: (3)
ESMS 3050 - Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
Dance (Ballet) (3)
Math (3) \* History (3)\*
THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620
Dance (Jazz) (3)
Dance (Contemporary)

#### Semester Totals 30 hours

#### Junior Year

ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) DANC 3101 - History of Dance Credit Hours: (3) DANC 3201 - Dance Movement Analysis Credit Hours: (3) DANC 4201 - Dance Composition I Credit Hours: (3)

Humanities Gen Ed Social Science (3)\* ESMS 3853 - Motor Behavior **Credit Hours: (3)** DANC 4404 - Dance Teaching Methods **Credit Hours: (3)** Elective (3)

#### Semester Totals 30 hours

#### Senior Year

COMM 2381 - Oral Communication \*\* Credit Hours: (3)
THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562 THEA 3563 or THEA 3620
ESMS 4000 - Exercise Testing Interpretation Lab Credit Hours: (3)
ESMS 4605 - Internship Credit Hours: (3-6)
Dance (Contemporary)

Social Science (3)\* Dance (Ballet) (3) Semester Totals 28 hours

Total Hours: 120

Total Hours required for Graduation: 120

# Theatre - Design and Technical Production Concentration, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

The Major (79 hours)

### Major Core (12 hours)

Choose two (2) design/tech courses from the following:

THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills
 Required Courses (6 hours)
 THEA 3412 - Directing Experiments Credit Hours: (3)
 THEA 4541 - Internship Credit Hours: (1-3)

### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

# Concentration (67 hours)

### Design and Technical Production (32 hours)

Choose three (3) additional design/tech courses from the following:

THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563, or THEA 3620

THEA 2512 - Intro Theatre Graphics Credit Hours: (2)

THEA 3601 - Mgmt/Publicity Prod Lab Credit Hours: (1) THEA 3602 - Costumes Production Lab, THEA 3603 - Lighting and Sound Production Lab, THEA 3605 - Scenery Production Lab, THEA 3606 - Props Production Lab, THEA 3608 - Dance Production Lab, THEA 3609 - Stage Management Lab

THEA 4554 - Visual History | Credit Hours: (3)

- THEA 4539 Contemporary Theatre History Credit Hours: (3)
- THEA 4558 Visual History II Credit Hours: (3)
- THEA 4582 Script Interpretation Credit Hours: (3)

### Technology Courses (10 hours)

Choose 10 hours from the following technical courses. Each course is two (2) credits each except THEA 3620 which is three (3) credits: THEA 2514 - Theatre Drafting Credit Hours: (2)

THEA 3620 - Stage Management Skills Credit Hours: (3)

THEA 3621 - Introduction to Prop Craft Credit Hours: (2)

THEA 4511 - Automation & Mechanization Credit Hours: (2)

THEA 4513 - Digital Fabrication Credit Hours: (2)

THEA 4516 - Technical Direction Credit Hours: (3)

THEA 4555 - Scenic Technology Credit Hours: (3)

THEA 4556 - Light & Sound Tech Credit Hours: (3)

THEA 4557 - Costume Technology | Credit Hours: (2)

THEA 4573 - Costume Technology II Credit Hours: (2)

### Design courses (16 hours)

Choose 16 hours from the following design courses. Each course is two (2) credits each: THEA 4512 - Digital Rendering Credit Hours: (2) THEA 4514 - Theatre Rendering Techniques Credit Hours: (3) THEA 4515 - Scene Painting Credit Hours: (3) THEA 4517 - Scene Painting II Credit Hours: (2) THEA 4561 - Scenic Design I Credit Hours: (2) THEA 4562 - Lighting Design I Credit Hours: (2) THEA 4563 - Costume Design I Credit Hours: (2) THEA 4565 - Costume Design II Credit Hours: (2) THEA 4568 - Sound Design II Credit Hours: (2) THEA 4575 - Scenic Design II Credit Hours: (2) THEA 4577 - Lighting Design II Credit Hours: (2) THEA 4596 - Sound Design II Credit Hours: (2)

### Remaining Hours (7 hours)

Remaining hours (7) are Design and Technical courses, other department courses, or non-department electives approved by the student's advisor.

# Typical 4-Year Design and Technical Production Concentration Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
History (3) \*
THEA 1030 - Intro to Theatre\*\* Credit Hours: (3)
THEA 3601-THEA 3609
THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills
THEA 2514 - Theatre Drafting Credit Hours: (2) (TECH)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Math (3) \* THEA 2512 - Intro Theatre Graphics Credit Hours: (2) THEA 3601-THEA 3609 (1) THEA 3412 - Directing Experiments Credit Hours: (3) 841 THEA 2511 - Intro Theatre Production, THEA 3511 - Stagecraft Credit Hours: (3) THEA 3515 - Costume Construction, THEA 3561 -Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 -Stage Management Skills

### Semester Totals 30 hrs

### Sophomore Year

Social/Behavioral Sciences (3) \* ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* COMM 2381 - Oral Communication \*\* Credit Hours: (3) Design Course (2) Tech Course (2) THEA 3601-THEA 3609 (1) THEA 3501, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620

THEA 4582 - Script Interpretation Credit Hours: (3) Design Course (2) Design Course (2) THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620 Tech Course (2) THEA 3601-THEA 3609 (1) Elective

### Semester Totals 33 hrs

### Junior Year

Design Course (2) Tech Course (2) THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620 THEA 4554 - Visual History I Credit Hours: (3) Natural Science (4)\* THEA 3601-THEA 3609 (1)

THEA 4558 - Visual History II Credit Hours: (3) Design Course (2) Tech Course (2) Elective (3) Social Science (3)\*

#### Semester Totals 28 hrs

### Senior Year

Natural Science (4)\* THEA 4541 - Internship **Credit Hours: (1-3)** Design Course (2) Design Course (2) THEA 3601-THEA 3609 (1) THEA 4549 - Theatre History **Credit Hours: (3)** 

THEA 4539 - Contemporary Theatre History Credit Hours: (3) THEA 4591 - Professional Theatre Practice Credit Hours: (3) History (3)\* Design Course (2) Semester Totals 29 hrs

Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Theatre - Musical Theatre Concentration**, (B.F.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

# The Major (79 hours)

### Major Core (12 hours)

Choose two (2) design/tech courses from the following:

- THEA 2511 Intro Theatre Production Credit Hours: (3) THEA 3511 Stagecraft, THEA 3515 Costume Construction, THEA 3561 -Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 -Stage Management Skills Required Courses (6 hours) THEA 3412 - Directing Experiments Credit Hours: (3)
- THEA 4541 Internship Credit Hours: (1-3)

#### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

# Concentration (67 hours)

### **Musical Theatre**

THEA 2501 - Stage Movement Credit Hours: (3) THEA 2503 - Basic Keyboard Skills/Actors Credit Hours: (1) THEA 2505 - Functional Keyboarding skills for Actors Credit Hours: (1) THEA 2532 - Acting | Credit Hours: (3) THEA 3200 (6) THEA 3212 - Vocal Prod & Articulation | Credit Hours: (3) THEA 3213 - Vocal Prod & Articulation || Credit Hours: (3) THEA 3531 - Acting II Credit Hours: (3) THEA 3551 - Audition Prep Performance Credit Hours: (3) THEA 3601-THEA 3609 (1)

THEA 4220 - Acting through Song | **Credit Hours:** (3) THEA 4223 - Acting through Song || **Credit Hours:** (3) THEA 4224 - Principle/Music Theory/Theatre **Credit Hours:** (3) THEA 4582 - Script Interpretation **Credit Hours:** (3) THEA 4591 - Professional Theatre Practice **Credit Hours:** (3)

### Dance Electives (12 hours)

Dance electives for 12 hours.

### Remaining Hours (9 hours)

Remaining hours (9) are Musical Theatre courses, other department courses, or non-department electives approved by the student's advisor.

# Typical 4-Year Musical Theatre Concentration Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
THEA 1030 - Intro to Theatre\*\* Credit Hours: (3)
THEA 2511 - Intro Theatre Production Credit Hours: (3) or THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills

THEA 2501 - Stage Movement Credit Hours: (3)

THEA 2503 - Basic Keyboard Skills/Actors Credit Hours: (1)

THEA 4224 - Principle/Music Theory/Theatre Credit Hours: (3)

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Social/Behavioral Sciences (3) *
MATH (3) *
History (3) *
THEA 2505 - Functional Keyboarding skills for Actors Credit Hours: (1)
THEA 3412 - Directing Experiments Credit Hours: (3)
THEA 3601-THEA 3609 (1)
```

### Semester Totals 33 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\*
THEA 3212 - Vocal Prod & Articulation | Credit Hours: (3)
DANC (Ballet) (3)
THEA 3200 - Musical Theatre Applied Voice Credit Hours: (1-2)
THEA 2532 - Acting | Credit Hours: (3)
THEA 3601-THEA 3609 (1)

COMM 2381 - Oral Communication \*\* Credit Hours: (3) History (3) \* THEA 3200 - Musical Theatre Applied Voice (1) DANC (Ballet) (3) THEA 3213 - Vocal Prod & Articulation || Credit Hours: (3) THEA 3531 - Acting || Credit Hours: (3)

#### Semester Totals 30 hrs

### Junior Year

THEA 3200 - Musical Theatre Applied Voice Credit Hours: (1-2) THEA 3551 - Audition Prep Performance Credit Hours: (3) DANC 3826 - Musical Theatre Dance | Credit Hours: (3) Elective (3) THEA 3601-THEA 3609 THEA 4220 - Acting through Song | Credit Hours: (3)

THEA 2511 - Intro Theatre Production Credit Hours: (3)
or THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills
THEA 4223 - Acting through Song II Credit Hours: (3)
Social/Behavioral Sciences (3) \*
THEA 3200 - Musical Theatre Applied Voice (1)
DANC 3827 - Musical Theatre Dance II Credit Hours: (3)
THEA 3601-THEA 3609

Semester Totals 28 hrs

### Senior Year

Natural Science (4) \* Elective (3) THEA 3200 - Musical Theatre Applied Voice Credit Hours: (1-2) THEA 4541 - Internship Credit Hours: (1-3) THEA 4549 - Theatre History Credit Hours: (3) THEA 4582 - Script Interpretation Credit Hours: (3)

Natural Science (4) \* THEA 3200 - Musical Theatre Applied Voice THEA 4591 - Professional Theatre Practice **Credit Hours:** (3) THEA 4548 - Musical Theatre History **Credit Hours:** (3) Elective (4)

Semester Totals 30 hrs

Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Theatre - Performance Concentration, (B.F.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that DANC 1151 or THEA 1030 and THEA 4548 or THEA 4549 will satisfy the General Education Humanities requirement. However, a minimum grade of "C-" is required in all departmental courses applicable to the major. Dance majors are required to take MUS 1030 as a second Humanities/Fine Arts requirement.

# The Major (79 hours)

# Major Core (12 hours)

Choose two (2) design/tech courses from the following:

 THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562 - Principles Costume Dsgn, THEA 3563 - Principles of Light & Sound Design or THEA 3620 - Stage Management Skills Required Courses (6 hours)
 THEA 3412 - Directing Experiments Credit Hours: (3)

THEA 4541 - Internship Credit Hours: (1-3)

### Note

While not listed within the previous course numbers, please note that DANC 1151, THEA 1030, THEA 4548 and THEA 4549 are courses that are used to satisfy a Humanities/Fine Arts General Education requirement. Transfer students who have completed the Humanities/Fine Arts requirements and have not taken any of these in order to fulfill the requirements of the concentration must do so as a department elective.

# Concentration (67 hours)

### Performance

THEA 2501 - Stage Movement Credit Hours: (3) THEA 2532 - Acting | Credit Hours: (3) THEA 3212 - Vocal Prod & Articulation | Credit Hours: (3) THEA 3213 - Vocal Prod & Articulation || Credit Hours: (3) THEA 3506 - Stage Combat Credit Hours: (3) THEA 3531 - Acting || Credit Hours: (3) THEA 3532 - Acting || Credit Hours: (3) THEA 3551 - Audition Prep Performance Credit Hours: (3) THEA 3601-THEA 3609 (4) THEA 4531 - Acting Styles Credit Hours: (3) THEA 4457 - Vocal Style/Performance Credit Hours: (3) THEA 4539 - Contemporary Theatre History Credit Hours: (3) THEA 4582 - Script Interpretation Credit Hours: (3) THEA 4591 - Professional Theatre Practice Credit Hours: (3)

### Acting Electives (18 hours)

Choose six acting emphasis electives.

THEA 2504 - Singing for the Actor Credit Hours: (3) THEA 2515 - Stage Makeup Credit Hours: (2) THEA 4220 - Acting through Song | Credit Hours: (3) THEA 4221 - Stage Dialects Credit Hours: (3) THEA 4455 - Directing Narrative Theatre Credit Hours: (3) THEA 4501 - Adv Movement Styles Credit Hours: (3) THEA 4503 - Creative Dramatics Credit Hours: (3) THEA 4521 - Principles of Stage Direction Credit Hours: (3) THEA 4531 - Acting Styles Credit Hours: (3) THEA 4532 - Mask Performance Credit Hours: (3) THEA 4548 - Musical Theatre History Credit Hours: (3) THEA 4545 - Thea/African Diaspora Credit Hours: (3) THEA 4571 - Playwriting Credit Hours: (3) THEA 4631 - Acting for Film and TV Credit Hours: (3) DANC 1821 - Beginning Contemporary Dance Credit Hours: (3) DANC 1825 - Beginning Ballet Credit Hours: (3) DANC 1827 - Beginning Jazz Credit Hours: (3)

DANC 1831 - Tap Dance I Credit Hours: (3) DANC 2821 - Intermediate Contemporary Dance Credit Hours: (3) DANC 2825 - Intermediate Ballet Credit Hours: (3) DANC 2827 - Intermediate Jazz Credit Hours: (3)

### Remaining courses (6 hours)

The remaining courses can be non-departmental courses as well as Theatre and Dance courses. Courses should be approved by the student's advisor.

# Typical 4-Year Performance Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
History (3) \*
THEA 1030 - Intro to Theatre\*\* Credit Hours: (3)
THEA 3601-THEA 3609 (1)
THEA 2511 - Intro Theatre Production Credit Hours: (3) THEA 3511 - Stagecraft, THEA 3515 - Costume Construction, THEA 3561 - Principles Scene Design, THEA 3562, THEA 3563 - Principles of Light & Sound Design, or THEA 3620 - Stage Management Skills
THEA 2501 - Stage Movement Credit Hours: (3)

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Natural Science (4) \* History (3) \* THEA 3412 - Directing Experiments Credit Hours: (3) THEA 3601-THEA 3609 (1) Social/Behavioral Sciences (3) \*

### Semester Totals 33 hrs

### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Math (3) \* THEA 3212 - Vocal Prod & Articulation | Credit Hours: (3) THEA 2532 - Acting | Credit Hours: (3) THEA 3601-THEA 3609 (1) Elective

COMM 2381 - Oral Communication \*\* Credit Hours: (3) THEA 3213 - Vocal Prod & Articulation II Credit Hours: (3) THEA 3601-THEA 3609 (1) THEA 3531 - Acting II Credit Hours: (3) THEA 4582 - Script Interpretation Credit Hours: (3) THEA 2511, THEA 3511, THEA 3515, THEA 3561, THEA 3562, THEA 3563 or THEA 3620

Semester Totals 32 hrs

### Junior Year

THEA 3551 - Audition Prep Performance **Credit Hours:** (3) Social/Behavioral Sciences (3) \* THEA 3532 - Acting III **Credit Hours:** (3) THEA 4457 - Vocal Style/Performance **Credit Hours:** (3) Elective (3) THEA 3506 - Stage Combat Credit Hours: (3) Elective (3) Elective (3) THEA 4531 - Acting Styles Credit Hours: (3)

### Semester Totals 27 hrs

### Senior Year

Elective (3) Natural Science (4) Elective (3) THEA 4541 - Internship **Credit Hours:** (1-3) THEA 4549 - Theatre History **Credit Hours:** (3) THEA 4591 - Professional Theatre Practice **Credit Hours:** (3) Elective (3) Elective (3) THEA 4539 - Contemporary Theatre History **Credit Hours:** (3)

Semester Totals 28 hrs

Total Hours: 120

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Dance Minor**

Any student wishing to minor in Dance should see the administrative secretary who will assign an advisor. The minor must consist of a minimum of 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor.

# **Theatre Minor**

Any student wishing to minor in a theatre concentration - Performance or Design/Tech - should see the administrative secretary who will assign an advisor. The minor must consist of a minimum of 18 hours of approved coursework, 9 of which must be upper division. Coursework for all minors will be determined by the student in conference with the advisor.

# **College of Education**

KANDI HILL-CLARKE, Ed.D., Dean Room 215, E.C. Ball Hall (901) 678-5495 http://www.memphis.edu/coe/

The College of Education is dedicated to preparing students for careers in a variety of professional and related occupational areas. In helping the university pursue its three broad objectives of teaching, public service, and research, the College of Education is committed to the following missions.

The first mission of the College of Education is to prepare teachers, other licensed school personnel, and educationally related professionals who are qualified and competent in both practice and theory. The second mission is to conduct educational and educationally related research and to engage in the dissemination of the outcomes of that research. The third mission of the college is tightly interwoven with the two preceding missions, that is: to provide teaching, research and service that extends beyond the confines of the campus and to make educational delivery available in its urban setting and at other outreach locations.

The departments in the college value the pursuit and practice of quality teaching and research in a multicultural setting. Specifically, the college actively seeks to foster the advancement of knowledge and pedagogy involved in educational training in school and non-school settings. With a priority on urban related studies, both faculty and students are engaged in timely, diverse experiences of a scholarly nature.

This mission and vision for the College of Education is embodied in the theme of Educational Leaders. The college seeks to prepare leaders who demonstrate a thorough knowledge of the learning process, skill in instructional planning and delivery, and a disposition to create dynamic learning environments that incorporate multi-cultural knowledge into instructional design and delivery. Multiple performance assessment measures are used to identify what teacher candidates know and can do and their impact on P-12 students based on eleven learning outcomes derived from the Interstate New Teacher Assessment Support Consortium (INTASC) standards for teacher preparation.

# Organization

Three academic departments make up the College of Education: Counseling, Educational Psychology and Research; Instruction and Curriculum Leadership; & Leadership. One department offers undergraduate degrees, and all departments offer a variety of graduate degree programs.

In addition, there are several research and service units in the college: The Office of Teacher Education, Advising and Student Services, The Center for the Study of Higher Education, The Reading Center, The Center for Research in Educational Policy, The Barbara K. Lipman Early Childhood School and Research Institute, and the University Campus School.

#### **River City Partnership**

The River City Partnership is a collaborative partnership between UofM College of Education, Shelby County Schools, and the Achievement School District. For more information, please visit: River City Partnership.

# **BSED Requirements**

# **Professional Studies for Educators**

Professional studies in the College of Education consist of both subject matter, pedagogical knowledge, and specialized studies related to specific P-12 settings. All teacher education students will study knowledge and skills in human development, methods, technology, classroom management, cultural diversity, balanced assessment, and differentiated instruction. Students must also know and display professional dispositions expected of educators. Skills in assessment, behavior management and specialized instructional methods are incorporated in courses delivered by their respective specialty areas. Specific requirements are listed in the section of the Catalog addressing each major.

# Accreditation

The College of Education holds membership in the American Association of Colleges for Teacher Education. Its undergraduate programs, as well as all graduate degree programs through the doctoral degree for the preparation of teachers and related school personnel, are approved by the Tennessee State Department of Education. The College is fully accredited by the National Council for Accreditation of Teacher Education (NCATE).

# **Licensure Areas**

Areas of licensure that are available at the completion of undergraduate education programs include:

Interventionist K-8 (144)

Interventionist 6-12 (145)

Physical Education K-12 (420)

Elementary K-5 (120)

Early Childhood PreK-3 (467)

Visual Arts K-12 (427)

Music Inst. K-12 (429)

Music Voc./Gen K-12 (428)

Visual Arts K-12 (427)

English as a Second Language PreK-12 (490)

Elementary K-5 (120);

Early Childhood Pre K-3 (467)

Interventionist K-8-(144)

Interventionist 6-12 - (145)

Special Education Comprehensive K-12 (461)

Physical Education K-12 (420)

# Secondary

English 6-12 (159)

- French 6-12 (163)
- German 6-12 (164)
- Spanish 6-12 (169)
- Russian 6-12 (168)
- Latin 6-12 (167)
- Mathematics 6-12 (125)

Biology 6-12 (126)

Chemistry 6-12 (127)

Physics 6-12 (129)

Earth Science 6-12 (128)

History 6-12 (133)

Government 6-12 (132)

Geography 6-12 (131

Psychology 9-12 (426)

Sociology 9-12 (425

Students who intend to enter the Master of Arts in Teaching program should consult the MAT advisor about this program to ensure that the general education curriculum, pre-professional studies, and teacher licensure requirements are completed.

# **Endorsements at the Graduate Level**

Speech/Language Pre K-12 (464)

School Counselor PreK-12 (487)

Instructional Leadership PreK-12 (442)

Instructional Leadership Professional (443)

School Psychologist PreK-12 (489)

Library Information Specialist PreK-12 (473)

English as a Second Language PreK-12 (490)

Reading Specialist PreK-12 (486) add on endorsement

# **Admission to Teacher Education Program**

Students who plan to pursue an undergraduate program of studies leading to teacher licensure must submit a formal application to the College of Education Teacher Education Program (TEP). Students are encouraged to apply for admission in their sophomore year.

Prerequisites for Provisional admission to the Teacher Education Program are as follows:

Complete a minimum of 45 semester hours.

Complete and submit the TEP application. Applications can be downloaded from the following site: http://www.memphis.edu/coe/

- TALN and HDVL students must complete with a grade of C- or above ENGL 1010, ENGL 1020, EDPR 2111, MATH 1420 (or an equivalent math course). ITGS/Secondary Math students must complete ENGL 1010, ENGL 1020, EDPR 3302, MATH 1530.
- Take and submit satisfactory scores on the CORE Academic Skills for Educators. Students scoring a 22 or above on the Enhanced ACT do not have to take the CORE. Passing scores for the CORE: Reading 1156, Writing 162, and Mathematics 150.
- Earn and maintain a GPA of no less than 2.75. An undergraduate student whose cumulative grade point average drops below 2.75 will not be provisionally admitted/retained in the Teacher Education Program.
- Submit and request forwarding to the Office of Teacher Education and Student Support Services a Tennessee Bureau of Investigation criminal history background check.

For detailed steps on how to complete this process visit: <u>http://www.memphis.edu/tep/clinical/background-checks.php</u>.

Candidates who do not meet the regular Teacher Education Program (TEP) Provisional Admissions criteria may apply for alternative admission based on the following policy:

# **Alternative Admission Based on CORE Scores**

The candidates must meet the minimum cut-off scores for two of the three subtests or they cannot appeal. The writing subtest must be passed by all candidates.

The appealed CORE subtest score (math or reading) cannot vary more than 3% (5 points) from the acceptable minimum score.

Candidates who do not meet the minimum requirements must meet the following guidelines to submit an appeal based on CORE: Must have a GPA of 3.00.

Must have taken the CORE subtest in question twice.

- If appealing the Reading Subtest, the student must have at least a 3.00 average in general education literature course and a general education history course.
- If appealing the Mathematics Test, the student must have a 3.00 average in all required mathematics courses in the general education curriculum.

All the above courses must be taken at an accredited college.

Candidates MUST have taken all relevant core courses as described above for their appeals to be considered.

Candidates who have the required grade point average and the required grades in the specified courses may be approved by the Director of Teacher Education without further appeal committee action.

# **Alternative Admission Based on Grade Point Average**

Candidates appealing to be Provisionally admitted to TEP because their grade point average has fallen below 2.75 must meet the following requirements in order to appeal:

Must have passed all sections of the CORE

Must provide, as part of their appeal, a plan describing the courses they will repeat or take to raise their grade point average to the 2.75 minimum and a proposed timeline. No restricted courses can be included in the plan.

Special Notes:

Candidates may not appeal for alternative admission if they have less that a 2.50 grade point average and have not met the minimum requirements of the CORE. These students will be advised individually regarding a remediation plan to improve their grade point average and/or PPST performance. In some instances, the candidate may be counseled out of the program.

# Retention

Candidates may be referred for retention throughout their program of studies. If candidates' graded point average drops below the required 2.75 while in Provisional Admission status, they will not be allowed to take any restricted courses in subsequent semesters and will lose their TEP admission status. Referrals can be made for academics, but also for professional dispositions related to ethical or attitudinal problems. There are also specific actions that can result in Disqualification (http://www.memphis.edu/tep/admission/disqualification.php). The College of Education Professional Dispositions guide the retention process. Candidates may be referred for counseling or be reviewed before the TEP Retention Committee.

# **Pre-Student Teaching Clinical Experiences**

Students pursuing teacher licensure complete, as a part of their program, a variety of required clinical experiences incorporated into professional education courses. Students will be expected to have experiences in a variety of settings (real and virtual) and with pupils who reflect differences in age, socioeconomic backgrounds, and cultural heritage.

Clinical experiences include both laboratory experiences (typically fulfilled on campus) and clinical experiences (typically fulfilled in PreK-12 schools). The early childhood programs require field experiences in PreK-3 grades. Other licensure programs require placements in a variety of grades (K-12). The amount of time spent in a clinical experience varies according to the specific requirement being met. Fulfillment of these experiences requires that students make available out-of-class time between 7:00 a.m. and 4:00 p.m. All students are required to complete the number of clinical experience hours expected in their licensure area.

Completion of field experiences will occur in sites arranged and approved by the University of Memphis College of Education Office of School Based Clinical Practice.

# Full Admission to Teacher Education Program and Residency

Teacher candidates entering their Junior year of study must meet the requirements for Full Admission to the Teacher Education Program and the Yearlong Residency. These requirements include:

Overall grade point average of 3.0. Praxis Content Knowledge must now be passed prior to Residency II.

# **Residency II/ Second Semester Senior Year**

Students who pursue degree programs at the University of Memphis that lead to teacher licensure must complete their Residency II in placements arranged, coordinated, and approved by the Clinical Coordinator of the College of Education. Residency II teaching assignments are full day in length for 15 weeks.

Residency II is offered only during the spring semesters in partnership schools. No Residency assignments for initial licensure are made during the summer semester. Under the direction of Preservice Instructive Mentors (PIM), and Residency II Supervisors, candidates are afforded opportunities to co-plan, co-teach, and co-assess in the PIM's classroom. In addition, all teacher candidates must submit an edTPA for national scoring. edTPA is the capstone assessment for all programs and success is required for a successful Residency II.

#### NO OTHER COURSES MAY BE TAKEN DURING RESIDENCY II EXCEPT FOR THE PROFESSIONAL SEMINAR.

Grades in Residency II are reported as "S" (satisfactory) or "U" (unsatisfactory).

Requirements for enrollment in yearlong Residency are:

File an application the semester before Residency I.

Gain full admittance to and be in good standing in the Teacher Education Program one semester before the Residency Year (senior year). Attain classification as a senior with a minimum grade point average of 3.0.

Complete of all prerequisite professional education courses.

Earn a minimum grade of "C-" in University General Education Program courses, each required professional education course, and each course in the major.

Submit passing scores on all remaining required Praxis II licensure exams for the specific area of licensure being sought prior to Residency II. Candidates must submit scores on the exam no later than 30 days prior to the first day of Residency II.

Must have a background check on file.

# Graduation

To be recommended for graduation and licensure, teacher candidates must complete the requirements listed below:

Minimum of 120 semester hours, including at least 45 hours of upper division courses.

Overall minimum GPA of 3.0.

A minimum GPA of 3.0 in all courses taken at the University of Memphis, excluding all credit transferred from other institutions.

Minimum grade of "C" in each required professional education course and each course in the major. Candidates can only repeat a professional education course once. Failure to make a satisfactory grade on the second attempt will result in disqualification from the teacher education program.

Submit scores for all Praxis II licensure exams.

Successfully complete the Teacher Performance Assessment (edTPA).

For Tennessee Teacher Licensure, students must obtain satisfactory scores for Specialty Area Examinations of the PRAXIS II, according to the criteria established by the Tennessee State Board of Education.

Any courses taken in excess of those needed to fulfill the requirements of professional education courses and major and minor endorsement areas, are considered to be general electives and are included only in the calculation of the overall GPA. In those areas where students are required to take elective courses, the student, in consultation with and approval of the major advisor, designates where the elective courses are to be applied.

# Majors

In addition to completing the degree requirements listed above for teacher licensure, B.S.Ed., students must complete requirements for the Human Development and Learning, Integrative Studies, Physical Education Teacher Education, and Teaching All Learners. Following the requirements for these majors are the requirements for the non-licensure degree and majors offered through other departments in the college.

# **B.S. ED REQUIREMENTS (NON-LICENSURE)**

Students may complete a non- major in the Department of Instruction and Curriculum Leadership. Degree requirements for this include the following:

# Graduation

In addition to specific course requirements listed below, students must complete the following:

Minimum of 120 semester hours of which at least 45 hours must be upper division and at least 45-51 hours must be liberal content courses. Overall minimum GPA of 2.00.

A minimum GPA of 2.00 in all credits earned at the University of Memphis excluding all credit transferred from other institutions.

A minimum GPA of 2.25 in all courses required for fulfilling the completion of the major.

**NOTE:** Any courses taken in excess of those needed to fulfill the requirements of the major are considered to be general electives and are included only in the calculation of the overall GPA. In those areas where students are required to take elective courses, the student in consultation with and approval of the major advisor, designates where the elective courses are to be applied.

Individual program requirements described in *the University of Memphis Undergraduate Catalog* are subject to change. Please consult the college level advisor for changes that may occur before publication of the next issue of this *Catalog*.

# **Department of Counseling, Educational Psychology and Research**

Educational Psychology & Research (EDPR) is located in the College of Education. Educational Psychology & Research is a specialized field of psychology that deals with teaching, learning, and development; and how to design and measure quantitatively and qualitatively all things related to contexts in which individuals teach and learn. If your interests are related to scientifically understanding human development (e.g., cognitive, social, emotional), teaching strategies (traditional, art-based, elearning), and learning processes (e.g., self-regulation, motivation, resilience) you might be seeking to minor in Educational Psychology & Research. Our areas of interest are embedded in cultural differences and the assumption that context is relevant. Educational Psychology & Research compliments a breadth of undergraduate majors and adequately prepares students to seeking Master and Doctoral degrees.

# **Educational Psychology & Research Minor**

# Requirements

The minor consists of 18 credits consisting of the following REQUIRED and ADDITIONAL coursework.

Required core courses (9 hours) EDPR 2111 - Development Across Lifespan Credit Hours: (3) EDPR 3121 - Learning Process/Assessment Credit Hours: (3) EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3)

Additional 9 credit hours EDPR 3302 - Child/Adolescent Development Credit Hours: (3) EDPR 4008 - Prob: Ed Psych/Research Credit Hours: (1-3) EDPR 4009 - Directed Reading Credit Hours: (1-3) EDPR 4010 - Supervised Research Credit Hours: (1-3) EDPR 4301 - Early Child Dev/Begin Teacher Credit Hours: (3)

# **Department of Instruction and Curriculum Leadership**

Program objectives for a B.S.Ed. are: (a) to understand how learning occurs, how students construct knowledge and acquire skill, and to provide learning opportunities that support students' intellectual, social, and personal development; (b) to adapt instructional techniques to students of diverse cultural and language backgrounds and those with exceptional learning needs.

854 Successful completion of B.S.Ed. requirements with a major in Teaching All Learners will qualify a person to apply for licensure in Elementary (K-5) and/or Special Education Interventionist K-8 and 6-12. All candidates must complete program requirements and will be eligible for either one or both licensure areas. Consult an advisor in the College of Education.

# Human Development and Learning, (B.S.Ed.)

Program objective for a B.S.Ed. in Human Development and Learning are: (a) to promote child development and learning; (b) to build family and community relationships; (c) to observe, document, and assess young children and families; (d) to teach and learn, to design, implement and evaluate experiences that promote positive development and learning for all children.

Successful completion of B.S.Ed. requirements with a major in Human Development and Learning will qualify a person to apply for licensure in Early Childhood Education (PreK-3).

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# Mathematics (3 hours)

MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3)

### Humanities (9 hours)

### Choose One:

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

### Choose One:

ART 1030 - Intro to Art\*\* **Credit Hours:** (3) MUS 1030 - Introduction to Music\*\* **Credit Hours:** (3) THEA 1030 - Intro to Theatre\*\* **Credit Hours:** (3)

### Choose One:

```
CLAS 2481 - Mythology ** Credit Hours: (3)
PHIL 1101 - Intro to Philosophy Credit Hours: (3)
PHIL 1102 - Intro to Ethics ** Credit Hours: (3)
POLS 1101 - Intro Ancient Political Thgt ** Credit Hours: (3)
POLS 1102 - Intro Modern Political Thought ** Credit Hours: (3)
```

### History (6 hours)

### Choose One:

```
HIST 2010 - U S to 1877 Credit Hours: (3)
HIST 2020 - The U S Since 1877** Credit Hours: (3)
HIST 2030 - Tennessee History** Credit Hours: (3)
```

### Choose One:

#### Social/Behavioral Sciences (6 hours)

#### Choose One:

ESCI 1301 - Survey of World Regions Credit Hours: (3) ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)

#### Required Course:

POLS 1030 - American Government\*\* Credit Hours: (3)

#### Natural Science (8 hours)

(Choose one course and applicable lab from List 1 and List 2)

### List 1

```
BIOL 1010 - Biology of Cells** Credit Hours: (3) and
BIOL 1011 - Biology of Cells Lab ** Credit Hours: (1) or
BIOL 1020 - Biology of Organisms** Credit Hours: (3) and
BIOL 1021 - Biology of Organisms Lab ** Credit Hours: (1)
```

#### List 2

PHYS 1010 - Introductory Physics Credit Hours: (3) PHYS 1001 - Introductory Physics Lab Credit Hours: (1) PHYS 1020 - Survey of Astronomy I Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) ESCI 1010 - Weather and Climate Credit Hours: (4) ESCI 1020 - Landforms \*\* Credit Hours: (4) ESCI 1040 - Physical Geology Credit Hours: (4) ESCI 1103 - The Human Planet Credit Hours: (4)

### Related Liberal Studies (8 hours):

EDPR 2111 - Development Across Lifespan Credit Hours: (3) PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2) ART 3411 - Art for Children Credit Hours: (3)

### The Major (30 hours)

### Core (24 hours):

SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) SPED 3803 - Classroom/Behavior Management Credit Hours: (3) IDT 3600 - Technology in Education Credit Hours: (3) EDPR 4301 - Early Child Dev/Begin Teacher Credit Hours: (3) ICL 4001 - Teaching/Diverse Environment Credit Hours: (3) Select One Course From Each of the Following Two Areas:

Race and Ethnicity:

SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3)

### Family/Culture/Gender:

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4411 - Urban Anthropology Credit Hours: (3) HIST 4863 - History/Childhood in America \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) or SOCI 4460 - Black/White Women in South Credit Hours: (3)

# Pre-Residency Semester (15 hours) offered in spring

Early Childhood Education (Grades PreK-3 Licensure) must take

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) ECED 4500 - Emergent Literacy/Lang Dev Credit Hours: (3) \* ECED 4005 - Fam/Sch Collaboration/ECED Credit Hours: (3) \* ECED 4520 - Plan/Facilitn Social Lrng/Dev Credit Hours: (3) \* ECED 4530 - Plan/FacItn Math/Science Lrng Credit Hours: (3) \*

# Residency I Semester (14 hours) offered in fall

Early Childhood Education (Grades PreK-3 Licensure) must take

ECED 4510 - Early Chld Prgms/Pr Credit Hours: (3) \* ECED 4515 - Teach/Lrng Erly Chld Ed Credit Hours: (3) \* ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \* ICL 4914 - Residency I Practicum Credit Hours: (5) \*

# Residency II Semester (12 hours) offered in spring

Early Childhood Education (Grades PreK-3 Licensure) must take

ICL 4800 - Residency II Prof Seminar Credit Hours: (3) \* ICL 4904 - Residency II Clinical Credit Hours: (9) \*

## Note

\*Requires admission to TEP.

# Typical 4-Year Human Development and Learning: PreK-3 Teacher Licensure Sequence

# Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Humanities (3) *
MATH 1420 - Foundations of Mathematics ** Credit Hours: (3)
History (3)
Fine Arts (3) *
```

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
EDPR 2111 - Development Across Lifespan Credit Hours: (3)
POLS 1030 - American Government** Credit Hours: (3)
Natural Science (4) *
History Selective (3)
```

### Semester Totals 31 hrs

# Sophomore Year

Take the CORE test once you have complete ENGL 1010, ENGL 1020, and MATH 1420.

```
EDPR 2111 - Development Across Lifespan Credit Hours: (3)

ENGL 2201 - Literary Heritage ** Credit Hours: (3)

or

ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)

IDT 3600 - Technology in Education Credit Hours: (3)

Natural Science (4) *

ESCI 1301 - Survey of World Regions Credit Hours: (3)

or

ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)

SPED 3803 - Classroom/Behavior Management Credit Hours: (3)

Race & Ethnicity Selective (3)

ART 3411 - Art for Children Credit Hours: (3)

COMM 2381 - Oral Communication ** Credit Hours: (3)

ENGL 4531 - Methods and Techniques ESL ** Credit Hours: (3)

PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2)
```

### Semester Totals 33 hrs

### Junior Year

TEP APPROVAL You will be delayed in graduating if you are not provisionally admitted to TEP by the end of the sophomore year and fully admitted by the end of the junior year. You must have a 3.0 GPA at this time.

ICL 4001 - Teaching/Diverse Environment **Credit Hours:** (3) EDPR 4301 - Early Child Dev/Begin Teacher **Credit Hours:** (3) ECED 3555 - Obsrv/Assmnt Infant/Erly Ch **Credit Hours:** (3) Family/Culture/Gender Selective (3) ECED 4005 - Fam/Sch Collaboration/ECED Credit Hours: (3) ECED 4520 - Plan/Facilitn Social Lrng/Dev Credit Hours: (3) ECED 4530 - Plan/Facltn Math/Science Lrng Credit Hours: (3) ECED 4500 - Emergent Literacy/Lang Dev Credit Hours: (3) ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3)

### Semester Totals 30 hrs

#### Senior Year

ECED 4510 - Early Chld Prgms/Pr Credit Hours: (3) ECED 4515 - Teach/Lrng Erly Chld Ed Credit Hours: (3) ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) ICL 4914 - Residency I Practicum Credit Hours: (5)

ICL 4904 - Residency II Clinical Credit Hours: (9) ICL 4800 - Residency II Prof Seminar Credit Hours: (3)

#### Semester Totals 26 hrs

### Total Hours: 120

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Integrative Studies, Secondary Math Concentration (B.S.Ed.)

Program objectives for a B.S.Ed. in Integrative Studies are: (a) to understand how learning occurs, how students construct knowledge and acquire skills, and knows how to provided learning opportunities that support their intellectual, social, and personal development; (b) to adapt instructional techniques to youth of diverse cultural and language backgrounds and to students who have exceptional learning needs.

Integrative Studies/Secondary Math Concentration: Program objectives for a B.S.Ed. in Integrative Studies/Secondary Math are: (a) to understand how learning occurs, how students construct knowledge and acquire skills, and knows how to provided learning opportunities that support their intellectual, social, and personal development; (b) preparing, through intensive clinical experiences, highly qualified math teachers grades 6-12.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

NOTE: The following University General Education Program requirements are specified by the department for this major:

### Mathematics (3 hours):

MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Humanities/Fine Arts (9 hours):

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

or

```
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

```
Select one Fine Arts:

ART 1030 - Intro to Art** Credit Hours: (3)

or

MUS 1030 - Introduction to Music** Credit Hours: (3)

or

THEA 1030 - Intro to Theatre** Credit Hours: (3)

Select an aditional Fine Arts or one of these courses:

CLAS 2481 - Mythology ** Credit Hours: (3)

PHIL 1101 - Intro to Philosophy Credit Hours: (3)

or

PHIL 1102 - Intro to Ethics ** Credit Hours: (3)

POLS 1101 - Intro Ancient Political Thgt ** Credit Hours: (3)

or
```

#### POLS 1102 - Intro Modern Political Thought \*\* Credit Hours: (3)

### History (6 hours):

```
HIST 1110 - World History to 1500** Credit Hours: (3)
-or-
HIST 1120 - World History since 1500** Credit Hours: (3)
HIST 2010 - U S to 1877 Credit Hours: (3)
-or-
HIST 2020 - The U S Since 1877** Credit Hours: (3)
-or-
HIST 2030 - Tennessee History** Credit Hours: (3)
```

### Social/Behavioral Sciences (6 hours):

```
POLS 1030 - American Government** Credit Hours: (3)

plus

ESCI 1301 - Survey of World Regions Credit Hours: (3)

or

ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)
```

### Natural Sciences (8 hours):

One biological science plus lab from: BIOL 1010 - Biology of Cells\*\* Credit Hours: (3) BIOL 1011 - Biology of Cells Lab \*\* Credit Hours: (1) BIOL 1020 - Biology of Organisms\*\* Credit Hours: (3) BIOL 1021 - Biology of Organisms Lab \*\* Credit Hours: (1) One physical science plus lab from: ESCI 1010 - Weather and Climate Credit Hours: (4) ESCI 1020 - Landforms \*\* Credit Hours: (4) ESCI 1040 - Physical Geology Credit Hours: (4) ESCI 1103 - The Human Planet Credit Hours: (4) PHYS 1010 - Introductory Physics Credit Hours: (3) PHYS 1001 - Introductory Physics Lab Credit Hours: (1) PHYS 1020 - Survey of Astronomy | Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) CHEM 1010 - Chemistry of Materials\*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php CHEM 1011 - Chemistry of Materials Lab \*\* Credit Hours: (1) CHEM 1020 - Chemistry of Life Credit Hours: (3) CHEM 1021 - Chemistry of Life Lab Credit Hours: (1)

# Secondary Math (grades 6-12)

The purpose of the Secondary Math Concentration is to prepare classroom teachers for the teaching of mathematics in grades 6-12.

### Related Liberal Studies (15 hours):

ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) EDPR 3302 - Child/Adolescent Development Credit Hours: (3) ICL 4001 - Teaching/Diverse Environment Credit Hours: (3) IDT 3600 - Technology in Education Credit Hours: (3)

### Major Core (26 hours)

MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3) MATH 3581 - College Geometry Credit Hours: (3) MATH 4151 - History of Mathematics Credit Hours: (3) MATH 4082 - Math/Mid School Teacher Credit Hours: (3) MATH 4080 - Math/Sec School Teachers I Credit Hours: (3) \* MATH 4081 - Math/Sec School Teachers II Credit Hours: (3) \*

#### Professional Education (38 hours below)

Requires admission to TEP. An application for the Residency Program must be submitted during your Pre-Residency Semester (by the first Tuesday in March) in Ball Hall Room 204. Application may be found here.

#### PreResidency (12 hours)

Requires admission to TEP:

LITL 4241 - Literacy in Grades 4-8 Credit Hours: (3)

- ICL 4004 Teach Mid Grade/Math Credit Hours: (3)
- ICL 4080 Math Methods High School I Credit Hours: (3)
- ICL 4081 Math Methods HS Teachers II Credit Hours: (3)

Residency I Semester (14 hours) offered in Fall:

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3)

ICL 4007 - Curriculum/Instr Sec Math Credit Hours: (3)

ICL 4008 - Teaching Math in Urban Schools Credit Hours: (3)

ICL 4914 - Residency | Practicum Credit Hours: (5)

Residency II Semester (12 hours) offered in Spring:

ICL 4907 - Stdnt Tchng/Secondary School Credit Hours: (2-10)

ICL 4800 - Residency II Prof Seminar Credit Hours: (3)

### Typical 4-Year Sequence for ITGS: Secondary (6-12) Math Licensure

### **Freshman Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) POLS 1030 - American Government\*\* Credit Hours: (3) Fine Arts (3) Humanities (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) ESCI 1301 - Survey of World Regions Credit Hours: (3) or ESCI 1401 - Intro/Cultural Geography Credit Hours: (3) US History (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) Natural Science (4)

### Semester Totals 35 hrs

### Sophomore Year

Take the CORE once you have completed ENGL 1010, ENGL 1020, and MATH 1530.

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
EDPR 3302 - Child/Adolescent Development Credit Hours: (3)
History (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
ICL 4001 - Teaching/Diverse Environment Credit Hours: (3)
IDT 3600 - Technology in Education Credit Hours: (3)
MATH 2702 - Intro Proof/Fundamental Math Credit Hours: (3)
BIOL 1010 - Biology of Cells\*\* Credit Hours: (3)

BIOL 1011 - Biology of Cells Lab \*\* Credit Hours: (1)

### Semester Totals 29 hrs

### Junior Year

TEP APPROVAL You will be delayed in graduating if you are not provisionally admitted to TEP by the end of the sophomore year and fully admitted by the end of the junior year. You must have a 3.0 GPA at this time.

MATH 4151 - History of Mathematics **Credit Hours:** (3) ICL 4004 - Teach Mid Grade/Math **Credit Hours:** (3) \* MATH 4082 - Math/Mid School Teacher **Credit Hours:** (3) ENGL 4531 - Methods and Techniques ESL \*\* **Credit Hours:** (3) LITL 4241 - Literacy in Grades 4-8 **Credit Hours:** (3) \*

ICL 4080 - Math Methods High School I Credit Hours: (3) \* ICL 4081 - Math Methods HS Teachers II Credit Hours: (3) \* MATH 4080 - Math/Sec School Teachers I Credit Hours: (3) MATH 3581 - College Geometry Credit Hours: (3) MATH 4081 - Math/Sec School Teachers II Credit Hours: (3)

### Semester Totals 31 hrs

### Senior Year

- ICL 3333 Stdnt Assess/Inst Dec Mkng Credit Hours: (3)
- ICL 4007 Curriculum/Instr Sec Math Credit Hours: (3)
- ICL 4008 Teaching Math in Urban Schools Credit Hours: (3)
- ICL 4914 Residency I Practicum Credit Hours: (5)
- ICL 4907 Stdnt Tchng/Secondary School Credit Hours: (2-10)
- ICL 4800 Residency II Prof Seminar Credit Hours: (3)

### Semester Totals 26 hrs

# Total: 120 hours

\* TEP restricted-Students should be provisionally admitted to TEP by the end of the sophomore year and full admitted by the end of junior year and have a 3.0 GPA.

\*\*Take the CORE once you have completed ENGL 1010, ENGL 1020, and MATH 1530

# Integrative Studies, Youth Services Concentraton (B.S.Ed.)

The Integrative Studies Youth Services concentration, a non-licensure concentration, does not require admittance to the Teacher Education Program (TEP), It does, however, require a 2.25 grade point average, C- or better in all courses in the major, and 45 upper-division hours for graduation.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

NOTE: The following University General Education Program requirements are specified by the department for this major:

# Mathematics (3 hours):

MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

### Humanities/Fine Arts (9 hours):

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
```

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Select one Fine Arts: ART 1030 - Intro to Art\*\* **Credit Hours:** (3) or MUS 1030 - Introduction to Music\*\* **Credit Hours:** (3) or THEA 1030 - Intro to Theatre\*\* **Credit Hours:** (3)

Select an aditional Fine Arts or one of these courses: CLAS 2481 - Mythology \*\* Credit Hours: (3)

PHIL 1101 - Intro to Philosophy Credit Hours: (3)

862

or

PHIL 1102 - Intro to Ethics \*\* Credit Hours: (3)

POLS 1101 - Intro Ancient Political Thgt \*\* Credit Hours: (3) or POLS 1102 - Intro Modern Political Thought \*\* Credit Hours: (3)

#### History (6 hours):

```
HIST 1110 - World History to 1500** Credit Hours: (3)
-or-
HIST 1120 - World History since 1500** Credit Hours: (3)
HIST 2010 - U S to 1877 Credit Hours: (3)
-or-
HIST 2020 - The U S Since 1877** Credit Hours: (3)
-or-
HIST 2030 - Tennessee History** Credit Hours: (3)
```

### Social/Behavioral Sciences (6 hours):

POLS 1030 - American Government\*\* Credit Hours: (3) plus ESCI 1301 - Survey of World Regions Credit Hours: (3) or ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)

#### Natural Sciences (8 hours):

One biological science plus lab from: BIOL 1010 - Biology of Cells\*\* Credit Hours: (3) BIOL 1011 - Biology of Cells Lab \*\* Credit Hours: (1) or BIOL 1020 - Biology of Organisms\*\* Credit Hours: (3) BIOL 1021 - Biology of Organisms Lab \*\* Credit Hours: (1) One physical science plus lab from: ESCI 1010 - Weather and Climate Credit Hours: (4) ESCI 1020 - Landforms \*\* Credit Hours: (4) ESCI 1040 - Physical Geology Credit Hours: (4) ESCI 1103 - The Human Planet Credit Hours: (4) PHYS 1010 - Introductory Physics Credit Hours: (3) PHYS 1001 - Introductory Physics Lab Credit Hours: (1) PHYS 1020 - Survey of Astronomy | Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) CHEM 1010 - Chemistry of Materials\*\* Credit Hours: (3) CHEM 1011 - Chemistry of Materials Lab \*\* Credit Hours: (1) CHEM 1020 - Chemistry of Life Credit Hours: (3) CHEM 1021 - Chemistry of Life Lab Credit Hours: (1)

### Youth Services Concentration

### Related Liberal Studies (Youth Services)

IDT 3600 - Technology in Education **Credit Hours:** (3) SPED 2000 - Foundation/Exceptional Learn **Credit Hours:** (3) ENGL 3500 - Practical English Grammar **Credit Hours:** (3) EDPR 2111 - Development Across Lifespan **Credit Hours:** (3) ICL 4001 - Teaching/Diverse Environment Credit Hours: (3) PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2) PSYC 1030 - General Psychology\*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

#### Major Core (Youth Services)

EDPR 3302 - Child/Adolescent Development Credit Hours: (3) LITL 4240 - Literacy in Grades K-4 Credit Hours: (3) SPED 4111 - Intro/Appl Behav Analysis Credit Hours: (3) SPED 4112 - Assess/Measure/Appl Behav Anly Credit Hours: (3) SPED 4113 - Appl Behav Intervent/Strateg Credit Hours: (3) SPED 4114 - Practitioner Issues/ABA Credit Hours: (3) ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3) ECED 4005 - Fam/Sch Collaboration/ECED Credit Hours: (3) LITL 3001 - Literacy Tutoring Credit Hours: (3) EDSV 4850 - Practicum/Training Settings Credit Hours: (1-3)

### Guided Electives (Youth Services)

Guided Electives (26 hours) - The following recommended:

ECED 4500 - Emergent Literacy/Lang Dev Credit Hours: (3) ECED 4510 - Early Chld Prgms/Pr Credit Hours: (3) ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PADM 4412 - Neighborhood Dev/Social Entrep Credit Hours: (3) EDSV 4950 - Internship/Training Settings Credit Hours: (3-12)

### Typical 4-Year Sequence for ITGS: Youth Services

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1420 - Foundations of Mathematics \*\* Credit Hours: (3) Fine Arts Selection
HIST 1110 - World History to 1500\*\* Credit Hours: (3) or
HIST 1120 - World History since 1500\*\* Credit Hours: (3)
POLS 1030 - American Government\*\* Credit Hours: (3)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
EDPR 2111 - Development Across Lifespan Credit Hours: (3)
COMM 2381 - Oral Communication \*\* Credit Hours: (3)

American History Humanities Selection

### Semester Totals 30 hrs

### Sophomore Year

SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) -or-ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php ENGL 3500 - Practical English Grammar Credit Hours: (3) IDT 3600 - Technology in Education Credit Hours: (3) ICL 4001 - Teaching/Diverse Environment Credit Hours: (3) ESCI 1301 or 1401 Natural Science & Lab

#### Semester Totals 31 hrs

#### Junior Year

```
EDPR 3302 - Child/Adolescent Development Credit Hours: (3)
LITL 4240 - Literacy in Grades K-4 Credit Hours: (3)
SPED 4111 - Intro/Appl Behav Analysis Credit Hours: (3)
SPED 4113 - Appl Behav Intervent/Strateg Credit Hours: (3)
ECED 4005 - Fam/Sch Collaboration/ECED Credit Hours: (3)
ENGL 4531 - Methods and Techniques ESL ** Credit Hours: (3)
PSYC 1030 - General Psychology** Credit Hours: (3)
SPED 4112 - Assess/Measure/Appl Behav Anly Credit Hours: (3)
SPED 4114 - Practitioner Issues/ABA Credit Hours: (3)
EDSV 4850 - Practicum/Training Settings Credit Hours: (1-3)
```

#### Semester Totals 30 hrs

#### Senior Year

```
EDSV 4950 - Internship/Training Settings Credit Hours: (3-12)
LITL 3001 - Literacy Tutoring Credit Hours: (3)
Elective (3)
EDSV 4950 (6) Internship
Elective (3)
```

Elective (3) Elective (2)

#### Semester Totals 29 hrs

#### Total: 120 Hours

## Teaching All Learners (leading to Elementary K-5 and Special Education Interventionist K-8 and 6-12 licensure), (B.S.Ed.)

University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

The following University General Education Program requirements are specified by the department for this major:

#### Humanities/Fine Arts:

Choose one of these: ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Plus one of these: ART 1030 - Intro to Art\*\* Credit Hours: (3) or MUS 1030 - Introduction to Music\*\* Credit Hours: (3) or THEA 1030 - Intro to Theatre\*\* Credit Hours: (3)

#### **Recommended Humanities**

Select one of these recommended Humanities: CLAS 2481 - Mythology \*\* **Credit Hours:** (3) PHIL 1101 - Intro to Philosophy **Credit Hours:** (3) PHIL 1102 - Intro to Ethics \*\* **Credit Hours:** (3) POLS 1101 - Intro Ancient Political Thgt \*\* **Credit Hours:** (3) POLS 1102 - Intro Modern Political Thought \*\* **Credit Hours:** (3)

#### Social/Behavioral Sciences:

POLS 1030 - American Government\*\* Credit Hours: (3)

#### Choose Either

ESCI 1301 - Survey of World Regions Credit Hours: (3) ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)

#### History:

#### **Choose Either**

HIST 2010 - U S to 1877 Credit Hours: (3) or HIST 2020 - The U S Since 1877\*\* Credit Hours: (3) or HIST 2030 - Tennessee History\*\* Credit Hours: (3)

#### **Choose Either**

HIST 1110 - World History to 1500\*\* Credit Hours: (3) or HIST 1120 - World History since 1500\*\* Credit Hours: (3)

#### Natural Sciences:

Choose one from list 1 and choose one from list 2

#### List 1:

```
BIOL 1010 - Biology of Cells** Credit Hours: (3) and
```

BIOL 1011 - Biology of Cells Lab \*\* Credit Hours: (1)

BIOL 1020 - Biology of Organisms\*\* Credit Hours: (3) and

BIOL 1021 - Biology of Organisms Lab \*\* Credit Hours: (1)

#### List 2:

```
ESCI 1010 - Weather and Climate Credit Hours: (4)
ESCI 1020 - Landforms ** Credit Hours: (4)
ESCI 1040 - Physical Geology Credit Hours: (4)
ESCI 1103 - The Human Planet Credit Hours: (4)
PHYS 1010 - Introductory Physics Credit Hours: (3)
PHYS 1001 - Introductory Physics Lab Credit Hours: (1)
or
PHYS 1020 - Survey of Astronomy I Credit Hours: (3)
PHYS 1002 - Astronomy Laboratory Credit Hours: (1)
```

### Related Liberal Studies (8 hours):

EDPR 2111 - Development Across Lifespan Credit Hours: (3) IDT 3600 - Technology in Education Credit Hours: (3) PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2)

### Major Core (18 hours):

Major core for Teaching All Learners:

SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) MATH 1480 - Math/Elem School Teachers I Credit Hours: (3) MATH 1481 - Math/Elem School Teachers II Credit Hours: (3) ICL 4001 - Teaching/Diverse Environment Credit Hours: (3)

### Professional Education (18 hours):

Teaching All Learners (Elementary (K-6) / Special Education Modified):

SPED 3803 - Classroom/Behavior Management Credit Hours: (3) ELED 3242 - Teaching/Learning Elem School Credit Hours: (3) LITL 4240 - Literacy in Grades K-4 Credit Hours: (3) \* SPED 3800 - Methods I/Instruct/Literacy Credit Hours: (3) ELED 3251 - Method/Teach Math/Elem Grades Credit Hours: (3) ELED 3271 - Method/Social Studies/Elem Grd Credit Hours: (3)

## Pre-residency (15 hours)

Elementary/Special Education Modified Licensure:

LITL 4241 - Literacy in Grades 4-8 Credit Hours: (3) \* SPED 3802 - Ed Assessment/Inclusive Set Credit Hours: (3) ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3) ELED 3261 - Method/Teach/Science/Elem Grde Credit Hours: (3) SPED 3804 - SPED Methods II. Content Area Credit Hours: (3)

### Residency I Semester (14 hours), offered in fall

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) SPED 4020 - Language/Comm/Diverse Classrm Credit Hours: (3) ICL 4021 - Professional/Ethical Practices Credit Hours: (3) ICL 4914 - Residency I Practicum Credit Hours: (5) \*

### Residency II Semester (12 hours), offered in spring

Elementary/Special Education Modified Licensure:

ICL 4800 - Residency II Prof Seminar Credit Hours: (3) \*

ICL 4904 - Residency II Clinical Credit Hours: (9)

#### Note

\*Requires admission to TEP.

NOTE: Several courses are taken as corequisites. Please refer to the latest degree plan and course descriptions for specifics.

# Typical 4-Year Sequence for Teaching All Learners: Elementary Education (K-6) and Special Education Modified (K-12) Licensure

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3) *
ART 1030 - Intro to Art** Credit Hours: (3) *
    or
MUS 1030 - Introduction to Music** Credit Hours: (3) *
    or
THEA 1030 - Intro to Theatre** Credit Hours: (3) *
MATH 1420 - Foundations of Mathematics ** Credit Hours: (3)
HIST 1110 - World History to 1500** Credit Hours: (3)
    or
HIST 1120 - World History since 1500** Credit Hours: (3)
ESCI 1301 - Survey of World Regions Credit Hours: (3)
    or
ESCI 1401 - Intro/Cultural Geography Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3) *
MATH 1480 - Math/Elem School Teachers | Credit Hours: (3) *
    Humanities
HIST 2010 - U S to 1877 Credit Hours: (3)
    or
HIST 2020 - The U S Since 1877** Credit Hours: (3)
    or
HIST 2030 - Tennessee History** Credit Hours: (3)
EDPR 2111 - Development Across Lifespan Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

ELED 3242 - Teaching/Learning Elem School Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \* IDT 3600 - Technology in Education Credit Hours: (3) MATH 1481 - Math/Elem School Teachers II Credit Hours: (3) Natural Science and Lab

PETE 3604 - Teach Phys Ed/Health/K-Middle Credit Hours: (2)
 POLS 1030 - American Government\*\* Credit Hours: (3)
 Natural Science and Lab
 SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)
 COMM 2381 - Oral Communication \*\* Credit Hours: (3) \*

#### Semester Totals 31 hrs

#### Junior Year

or

LITL 4240 - Literacy in Grades K-4 **Credit Hours:** (3) ELED 3251 - Method/Teach Math/Elem Grades **Credit Hours:** (3) ELED 3271 - Method/Social Studies/Elem Grd **Credit Hours:** (3) SPED 3803 - Classroom/Behavior Management **Credit Hours:** (3) SPED 3800 - Methods I/Instruct/Literacy **Credit Hours:** (3) ICL 4001 - Teaching/Diverse Environment **Credit Hours:** (3)

LITL 4241 - Literacy in Grades 4-8 Credit Hours: (3) SPED 3802 - Ed Assessment/Inclusive Set Credit Hours: (3) SPED 3804 - SPED Methods II. Content Area Credit Hours: (3) ELED 3261 - Method/Teach/Science/Elem Grde Credit Hours: (3) ENGL 4531 - Methods and Techniques ESL \*\* Credit Hours: (3)

#### Semester Totals 33 hrs

#### Senior Year (Residency Year)

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) ICL 4021 - Professional/Ethical Practices Credit Hours: (3) ICL 4914 - Residency I Practicum Credit Hours: (5) SPED 4020 - Language/Comm/Diverse Classrm Credit Hours: (3)

ICL 4904 - Residency II Clinical Credit Hours: (9) ICL 4800 - Residency II Prof Seminar Credit Hours: (3)

#### Semester Totals 26 hrs

#### Total Hours Required for Graduation: 120

\*Must satisfy General Education Program Requirements

## **Applied Behavior Analysis Minor**

A minor in ABA can equip undergraduate students to become a registered behavior technician (RBT) and can help prepare a future or current teacher, school counselor, psychologist, paraprofessional, physical therapist, occupational therapist or other school-based or clinic-based support staff with a strong knowledge base of classroom management strategies, behavior change procedures, and interventions related to working with children, adolescents, and/or adults. This minor will provide both depth of foundational knowledge in ABA and the breadth of interconnected experiences to benefit many career goals or future educational goals in a number of fields. With a minor in ABA, undergraduate students will be better equipped to interact with others as members of a team, in a classroom, or as entrepreneurs. In addition, the student will be prepared for

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

graduate work in ABA, Psychology, Counseling, Social Work, and other helping careers. All courses are all designed to meet the current standards set forth by the Behavior Analysis Certification Board (BACB) allowing the students with this minor to sit for national exam which leads to certification as a Registered Behavior Technician (RBT). An RBT is primarily responsible for the direct implementation of behavior-analytic services and working directly with the clients as they help the child and family reach their individual goals.

#### Required Core Courses: 12 hours

SPED 4111 - Intro/Appl Behav Analysis Credit Hours: (3)

SPED 4112 - Assess/Measure/Appl Behav Anly Credit Hours: (3)

SPED 4113 - Appl Behav Intervent/Strateg Credit Hours: (3)

SPED 4114 - Practitioner Issues/ABA Credit Hours: (3)

#### Additional Courses: 6 hours

SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)

SPED 3201 - Behv Supt Stdnt Diverse Set Credit Hours: (3)

SPED 3803 - Classroom/Behavior Management Credit Hours: (3)

SPED 4900 - Consultation Schl/Fmly/Cmty Credit Hours: (3)

## **College of Professional & Liberal Studies**

**College of Professional & Liberal Studies** 

RICHARD IRWIN, EdD., Executive Dean Room 201, John Willard Brister Hall (901) 678-2991 www.memphis.edu/cpls/

The College of Professional & Liberal Studies offers students a wide variety of traditional and online degree opportunities. Faculty from across the university provide the structure to explore and develop unlimited interdisciplinary, academic ventures. College of Professional & Liberal Studies also seeks to create and maintain a spirit of academic community through careful and concerned advising and interaction outside the classroom among students, faculty, staff, and community professionals. Program objectives for majors in the College of Professional & Liberal Studies are to demonstrate: (a) the theoretical and practical applications of their coordinated study area (i.e., major); (b) knowledge of appropriate communications practices, including effective writing, computer skills, and oral communications; (c) the ability to solve problems, to work independently and to work as members of a team in a professional setting through an experiential-learning environment; and (d) the ability to address significant problems, themes, and ideas which impact a global society.

#### Admission to College

#### Admission

In addition to following the procedure for admission to the University of Memphis, prospective students seeking admission to the College of Professional & Liberal Studies must also declare a major within the college. The form can be found at https://www.memphis.edu/cpls/resources/dom.php

#### **Student Evaluation**

A student's performance is evaluated by: a traditional grading system (A-F), Satisfactory/Unsatisfactory, and Credit/No Credit options supplemented by written narrative evaluations; credit or placement by examination; Advanced Placement examinations for degree credit where available; and credit for validated learning from experience or non-traditional instruction. Of the 120 credit-hours required for graduation at least 30 of the last 60 hours must be earned through credit at the University of Memphis.

#### **College Requirements**

The College of Professional & Liberal Studies offers the Bachelor of Professional Studies (B.P.S.), the Bachelor of Liberal Studies (B.L.S.), and Commercial Aviation (B.S.) undergraduate degrees. These degrees require completion of the following:

#### **General Education Courses (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

#### **Coordinated Study**

The Coordinated Study (i.e., courses that make up a student's major) must consist of courses from two or more academic disciplines.

Coordinated Study credit may be earned through courses offered by other departments on campus, credit by examination, credit for experiential learning, transfer credit, internships, or independent study courses.

Students must earn a minimum grade of 2.0 in each graded course and a minimum of 2.20 GPA overall in the Coordinated Study. All Coordinated Study plans must include a minimum of 9 graded upper-division hours taken at The University of Memphis. These credit-hours must be earned in courses from two or more departments.

#### **Thematic Studies**

Thematic Studies courses examine a particular theme, problem, issue, or epoch from several points of view. These upper-division courses are designed to provide ways for undergraduates to integrate previous learning. All College of Professional & Liberal Studies students must complete a minimum of 6 credit-hours of thematic studies courses. A list of thematic studies courses can be found at https://www.memphis.edu/cpls/resources/thematic\_studies.php

872

#### **The Senior Project**

The Senior Project should include academic research or other creative activity resulting in a tangible project to demonstrate synthesis of a student's Coordinated Study. PREREQUISITE: Senior standing, final semester. A student must earn a minimum grade of "C" on the Senior Project.

#### Electives

Students may need to take lower or upper-division elective courses in order to reach the 120 credit-hours required for graduation. Such electives may typically be offered by any department at the University of Memphis.

#### Minors

Students majoring in any department within the University may enhance their academic experience through College of Professional & Liberal Studies (CPLS) minors in Alcohol and Drug Abuse Services, American Studies, Child Development, Community Action and Social Change, Legal Studies, and Religion in Society. If a College of Professional & Liberal Studies student chooses to complete a minor, courses within the minor must differ substantially from courses within the student's coordinated study. A College of Professional & Liberal Studies student may be certified as having a minor only if at least twelve hours taken for the minor are not included in the coordinated study.

#### The Baccalaureate Contract Program

Undergraduate students admitted to the College of Professional & Liberal Studies may design either of two degrees through the Baccalaureate Contract Program: the Bachelor of Liberal Studies (B.L.S.) or the Bachelor of Professional Studies (B.P.S.).

To be eligible for this program, a student must have a cumulative undergraduate grade point average of 2.0. Upper-division courses within the student's Coordinated Study (i.e., major) must be from two or more departments on campus. In addition, the proposed degree must be unlike any other degree offered by the University of Memphis.

A Baccalaureate Contract Advisor will assist the student in the development and execution of a degree program that serves the student's needs and meets the academic requirements of College of Professional & Liberal Studies and the University of Memphis. All baccalaureate contracts will be reviewed and approved by the baccalaureate contract advisor and by the Assistant Director of Student Services in the College of Professional & Liberal Studies. The baccalaureate contract must include work to be completed in the following areas: (1) General Education, (2) Coordinated Study, (3) Thematic Studies, (4) a Senior Project, and (5) General Electives.

#### **Experiential Learning**

Experiential Learning Credit may be granted for college level knowledge and understanding related to the student's area of study. This credit may be gained from work experience, life experience, or non-college instruction in one of the following ways: 1) pre-assessed military transcripts, 2) pre-assessed professional training, licensure, or certifications or 3) student developed learning portfolio reflective of their learning experiences which is assessed for credit by a faculty member. For more information: http://www.memphis.edu/innovation/elc/experiential\_learning.php

#### **TN eCampus**

#### The degrees offered are:

Bachelor of Professional Studies with concentrations in Information Technology, International Organizational Leadership, or Organizational Leadership

#### Bachelor of Liberal Studies

Tennessee colleges, universities, and technology centers joined to offer the TN eCampus degrees. All the institutions are fully accredited. Courses completed in the TN eCampus Programs are entirely online and transferable among all the participating institutions.

#### The courses are available online for the degrees offered through the TN eCampus Program.

For information about the requirements and courses for the TN eCampus, please see: https://tnecampus.org

#### A Second Bachelor's Degree

Students seeking to earn a second bachelor's degree through the College of Professional & Liberal Studies must satisfy all degree requirements of the college and the university.

A comprehensive list of programs related to the College of Professional & Liberal Studies can be found at: College of Professional & Liberal Studies

### **Baccalaureate Contract Program (Design Your Own Degree)**

Baccalaureate Contract Program (Design Your Own Degree)

Undergraduate students admitted to the College of Professional & Liberal Studies may design either of two degrees through the Baccalaureate Contract Program: the Bachelor of Liberal Studies (B.L.S.) or the Bachelor of Professional Studies (B.P.S.). To be eligible for this program, a student must have a cumulative undergraduate grade point average of 2.0. Upper-division courses within the student's Coordinated Study (i.e., major) must be from two or more departments on campus. In addition, the proposed degree must be unlike any other degree offered by the University of Memphis. All baccalaureate contracts will be reviewed and approved by a baccalaureate contract advisor and by the Assistant Director of Student Services in the College of Professional & Liberal Studies. The baccalaureate contract must include work to be completed in the following areas: (1) General Education, (2) Coordinated Study, (3) Thematic Studies, (4) a Senior Project, and (5) General Electives.

Additional information may be found on the College of Professional & Liberal Studies website.

### University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

#### College Requirements (9 hours)

#### Coordinated Study (33 or 36 hours)

33 or 36 upper-division hours from at least two disciplines/departments (Please note: A minimum of 12 hours in each discipline is required and no more than 21 hours in one subject area. Courses must tie together into a cohesive program.)

#### Thematic Studies (6 hours)

6 credit hours of Thematic Studies

### Senior Project (3 hours)

3 credit hours of Senior Project

#### **General Electives**

Approved general electives to bring the total hours earned to 120.

#### Graduation Requirements

At least 120 semester hours total with at least 42 upper division hours At least 30 semester hours must be awarded by UofM At least 45 semester hours at the 3000-4000 level

### Additional Information

Additional information may be found on the College of Professional & Liberal Studies website.

## **Commercial Aviation**, (B.S.)

The degree program in Commercial Aviation prepares persons for careers as airline pilots, or in a variety of aviation-related fields, such as corporate aviation, general aviation, aviation-related business, airport operations, and governmental regulation of aviation. It does so by offering studies in aviation, management, business operations, human resources, transportation, logistics and aviation administration. These studies are combined with flight labs, experiential learning, and internships in an aviation setting. Aviation training is provided by professional aviation instruction certified by the Federal Aviation Administration.

**Note:** Aviation students must have a Valid Class A FAA Aviation Medical Certificate conducted by an FAA medical examiner. The exam usually costs about \$120 and lasts 5 years. This should be completed no later than the student's first flight. A background check is also required.

For information on careers in this and other disciplines students should consult the career counselor located in 211 Wilder Tower, 678-2068.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Major Field Core (64 hours)

#### Management and Business Operations (6 hours)

```
ACCT 2010 - Fundamentals of Acct I ** Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II ** Credit Hours: (3)
MIS 2749 - Foundation/Information Systems ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
```

#### Human Resources, Staffing and Development (6 hours)

#### Choose One:

MGMT 3215 - Management of Human Resources \*\* **Credit Hours:** (3) MGMT 4260 - Employee Staffing/Training/Development \*\* **Credit Hours:** (3) MGMT 4420 - Organizational Behavior in Business \*\* **Credit Hours:** (3) LDSP 3000 - Leadership Development\*\* **Credit Hours:** (3) BMGT 3630 - Human Resource Mgmt\*\* **Credit Hours:** (3)

#### Choose One:

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) PSYC 3508 - Indust/Organizatnl Psyc Credit Hours: (3) COMM 3010 - Integrated Corp Comm\*\* Credit Hours: (3) PM 4120 - Organization Theory and Behav\*\* Credit Hours: (3)

#### Professional Aviation (52 hours)

#### Prerequisites to the aviation program: Private Pilot Certificate

AVIA 1700 - Aviation Safety Credit Hours: (3) AVIA 1800 - Systems I: Basic Aircraft Systems Credit Hours: (3) AVIA 2100 - Aerodynamics Credit Hours: (3) AVIA 2101 - Instrument/Commercial Flight Lab Credit Hours: (1) AVIA 2200 - Instrument/Commercial Ground School Credit Hours: (3) AVIA 2300 - Advanced Flight Lab Credit Hours: (1) AVIA 3200 - Commercial Ground School – Single Engine (ASEL) Credit Hours: (3) AVIA 3201 - Commercial Flight Lab - Single Engine (ASEL) Credit Hours: (1) AVIA 3300 - Commercial Ground School – Multi-Engine (AMEL) Credit Hours: (2) AVIA 3301 - Commercial Flight Lab Multi-Eng Credit Hours: (1) AVIA 3400 - Air Traffic Control and Airspace Credit Hours: (3) AVIA 3500 - Systems II: Turbine Aircraft Credit Hours: (3) AVIA 4200 - Systems III: Transport Category Aircraft Systems Credit Hours: (3) AVIA 4300 - Air Carrier Operations Credit Hours: (3) AVIA 4700 - Flight Instructor Ground School Credit Hours: (4) AVIA 4800 - Human Factors & Crew Resource Management Credit Hours: (3) ESCI 1010 - Weather and Climate Credit Hours: (4) ESCI 4216 - Synoptic Meteorology Credit Hours: (3)

### **College Requirements**

#### Thematic Studies (6 hours)

Students complete a total of 6 hours in a College of Professional & Liberal Studies thematic studies course(s). These courses are designed to broaden a student's knowledge of significant AVIA themes.

#### AVIA Thematic Studies Course are the Following:

AVIA 4550 - Aviation Law & Regulation Credit Hours: (3) AVIA 4560 - Aviation Physiology & Survival Credit Hours: (3)

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. For this concentration, the senior project is:

AVIA 4701 - Flight Instructor Certification Credit Hours: (3)

### General Electives (11 – 17 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

### Minimum Requirements for Graduation

- Students must complete at least 60 hours from a 4-year institution.
- Students must complete at least 42 hours of upper-division credit (3000 or 4000-level).
- Students must complete at least 30 of the last 60 hours through the University of Memphis.
- Students must complete at least 9 graded hours in the major at the University of Memphis.

## Liberal Studies, Asian Studies and International Trade, (B.L.S.)

See College of Professional & Liberal Studies website for additional information.

### General Education (35-41 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (39-51 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Foreign Language (9-21 hours)

Requirement: 9 hours at the 3000-level or above.

Students with previous background in the chosen language (Chinese or Japanese) must take the placement test to determine in what course they should enroll.

Students with no previous background in the chosen language will enroll in CHIN 1010 or JAPN 1010.

### Area Studies (6 hours)

Students must complete 6 hours from the following:

HIST 3290 - Traditional East Asia \*\* Credit Hours: (3) HIST 3291 - Modern Asia Credit Hours: (3) HIST 4292 - Modern China 1800-Present \*\* Credit Hours: (3) HIST 4294 - Modern Japan 1800-Present \*\* Credit Hours: (3)

#### International Economics and Business Studies (24 hours)

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) (Required) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) (Required) FIR 3410 - Financial Management \*\* Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

Recommended choices: ESCI 4307 - Thematic Studies/China Credit Hours: (3) UNIV 3550 - Clash of Cultures Credit Hours: (3) UNIV 4506 - The Chinese Credit Hours: (3)

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### Recommended Electives (hours vary)

ANTH 3200 - Culture and Change around the World Credit Hours: (3) /ESCI 3200(cross listed) ANTH 3511 - Culture/Kin/Family Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) ESCI 1301 - Survey of World Regions Credit Hours: (3) ESCI 1401 - Intro/Cultural Geography Credit Hours: (3) INTL 4601 - Seminar in International and Global Studies Credit Hours: (3) JOUR 4712 - Media and Cultures\*\* Credit Hours: (3) PADM 4401 - Comparative Public Adm\*\* Credit Hours: (3) POLS 1301 - Intro to Comparative Politics \*\* Credit Hours: (3) POLS 1501 - International Relations\*\* Credit Hours: (3) POLS 3310 - Politics/Developed World Credit Hours: (3) POLS 3320 - Human Rights/World Politics \*\* Credit Hours: (3) POLS 3325 - Politics/Developing World Credit Hours: (3) POLS 3330 - Politics/Globalization Credit Hours: (3) POLS 3505 - International Organizations Credit Hours: (3) POLS 3506 - American Foreign Policy \*\* Credit Hours: (3) POLS 3509 - Contmp Prblm Intl Relation Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3) POLS 4506 - Prob American Foreign Policy Credit Hours: (3) POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3) POLS 4511 - International Security Credit Hours: (3) SOCI 2100 - Sociology of Globalization Credit Hours: (3) SOCI 4413 - Global Info Tech & Soc of Work Credit Hours: (3)

## Liberal Studies, Judaic Studies (B.L.S.)

Bornblum Judaic Studies explores the experience of the Jewish people within the contexts of world cultures. Non-theological in its orientation, it provides students pursuing a concentration in Judaic Studies the opportunity to study related areas, including the history of the Jewish people, the structures and politics of Jewish communities, the Hebrew and Arabic languages, and the religious, intellectual, and aesthetic traditions of the Jewish people.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (45 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Lower Division Core (15 hours)

Group A: Hebrew Language Core HEBR 1010 - Elementary Hebrew | Credit Hours: (3) HEBR 1020 - Elementary Hebrew || Credit Hours: (3) HEBR 2010 - Intermediate Hebrew | Credit Hours: (3) HEBR 2020 - Intermediate Hebrew || Credit Hours: (3) Group B: Religious Studies Core JDST 2850 - Religions of Abraham Credit Hours: (3)

### Upper Division Core (6 hours)

HIST 3275 - History of Jewish People Credit Hours: (3) JDST 3601 - Judaism Credit Hours: (3) JDST 3801 - Ancient & Medieval Jewish Thought Credit Hours: (3)

#### Upper Division Electives (15 hours)

Group A: Jewish Heritage (pick 2 or 3) ENGL 4461 - Bible as Literature Credit Hours: (3) HIST 3275 - History of Jewish People Credit Hours: (3) JDST 3661 - Perspectives on the Old Testament Credit Hours: (3) JDST 3802 - Modern Jewish Thought Credit Hours: (3) JDST 4671 - Jewish Literary Texts Credit Hours: (3) JDST 4801 - Jewish Mysticism Credit Hours: (3) JDST 4820 - Political History of Israel Credit Hours: (3) JDST 4830 - Israeli/Arab Conflict Credit Hours: (3)

#### Interdisciplinary Electives (9 hours)

ARTH 4121 - Ancient Art Near East Credit Hours: (3) HIST 4272 - Modern Middle East \*\* Credit Hours: (3) HIST 4320 - Ancient Near East Credit Hours: (3) PHIL 3701 - Human and the Divine Credit Hours: (3) POLS 3102 - Religion and Politics Credit Hours: (3) SOCI 3860 - Sociology of Religion\*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

879

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (25-31 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## Liberal Studies, Religious Studies, (B.L.S.)

The concentration in Religious Studies is designed for students with a diversity of backgrounds and interests in religion. Students who are enrolled in the concentration may be considering employment in fields where a knowledge of different religious traditions would be an asset, such as counseling or social work, or they may be contemplating further study of religion in a theological seminary or religious studies graduate program. Religious Studies is a traditional liberal arts field that helps students to develop skills in critical thinking, the analysis of complex issues, and oral and written expression.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Religious Studies Core (12 Hours)

RLGN 1100 - Introduction to Religion \*\* Credit Hours: (3) RLGN 3100 - Perspectives on Religion Credit Hours: (3) UNIV 3580 - Hebrew and Greek Legacy\*\* Credit Hours: (3) UNIV 3581 - Faith/Reason/Imagination\*\* Credit Hours: (3)

### Religious Context Courses (24 Hours)

AAAS 4251 - African Religions/Diaspora Credit Hours: (3) ANTH 3253 - Anthropology of Religion Credit Hours: (3) CLAS 2481 - Mythology \*\* Credit Hours: (3) COMM 3100 - Communication Ethics \*\* Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) ENGL 4461 - Bible as Literature Credit Hours: (3) HIST 3273 - Islamic History to 1405 Credit Hours: (3) HIST 3274 - Islamic History since 1405 Credit Hours: (3) HIST 3275 - History of Jewish People Credit Hours: (3) HIST 3320 - Ancient World \*\* Credit Hours: (3) HIST 3370 - Medieval Europe Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) HIST 4276 - The Arab-Israeli Conflict Credit Hours: (3) HIST 4320 - Ancient Near East Credit Hours: (3) HIST 4322 - The Roman World Credit Hours: (3) JDST 2850 - Religions of Abraham Credit Hours: (3) JDST 3601 - Judaism Credit Hours: (3) JDST 3661 - Perspectives on the Old Testament Credit Hours: (3) JDST 4511 - Holocaust Studies Credit Hours: (3) PADM 3501 - Civic Engagement, Voluntarism Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations\*\* Credit Hours: (3) PHIL 3701 - Human and the Divine Credit Hours: (3) PHIL 3702 - Philosophy of Religion Credit Hours: (3) PHIL 3721 - Chinese Philosophy Credit Hours: (3) POLS 3102 - Religion and Politics Credit Hours: (3) RLGN 3001 - Exploring Christian History Credit Hours: (3) RLGN 3002 - Studies In Islam and Its Cultures Credit Hours: (3) SOCI 3860 - Sociology of Religion\*\* Credit Hours: (3) UNIV 3540 - Ethics & Professionalism \*\* Credit Hours: (3) UNIV 3565 - Comparative Christianity\*\* Credit Hours: (3) UNIV 3590 - New Testament Credit Hours: (3) UNIV 3585 - Ancient Empires & Contemporary Interpretations of the Old Testament \*\* Credit Hours: (3) UNIV 3592 - Religious Perspectives on Death and Afterlife Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 Hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 Hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (29-34 Hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## Professional Studies, Alcohol and Drug Abuse Services, (B.P.S.)

Students in the Alcohol and Drug Abuse Services concentration will select from a set of courses in alcohol & drug abuse and social and public service. Prior work experience is welcomed and evaluated through portfolio assessment. Internships are also included in this concentration. Persons pursuing this degree typically provide services to those disabled by alcohol and drug abuse, including abusers, families, friends, colleagues, and associates. Wishing to build upon knowledge and experience in alcohol and drug abuse treatment, persons served by these guidelines will seek careers in Alcohol & Drug Abuse (A&D) Services as providers of social and public services in hospitals, social service agencies, employee assistance programs, churches, etc. Some may wish to continue their education in graduate-level programs.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (30 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Professional Core (6 hours)

COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Alcohol and Drug Core (6 hours)

ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) CJUS 4152 - Drug Misuse and Abuse Credit Hours: (3) COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) (Prerequisites: PSYC 1030, PSYC 3010, PSYC 3020)

#### Professional Writing (3 hours)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) (Prerequisite - MIS 2749)

#### Social and Public Services (15 hours)

#### Choose from the following:

CJUS 4533 - Juvenile Delinq Theory/Process Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) PSYC 3102 - Abnormal Psychology Credit Hours: (3) PSYC 3103 - Child Psychology \*\* Credit Hours: (3) PSYC 3106 - Social Psychology \*\* Credit Hours: (4) SOCI 3501 - Sociology of Deviant Behavior \*\* Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3) SOCI 4852 - Sociology of Mental Illness Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3) (Prerequisites: SWRK 2911, SWRK 2010; BIOL 1010)

### Guided Electives and Internship (15 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php.

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### Electives

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## Professional Studies, Child Development and Family Studies, (B.P.S.)

The Bachelor of Professional Studies with a concentration in Child Development and Family Studies focuses on recognizing and enhancing important developmental milestones for children from birth through adolescence. Students will learn how to create effective learning environments to promote children's healthy development as well as assist parents in creating positive relationships and environments for the development of their children. In addition, students study the stages of development from infancy through adolescence and the ways that family, culture, peers, and schools influence the growth of children. Students will also explore the importance of advocacy for children and their families whether it be in the classroom, hospital, or justice system.

The B.P.S. with a concentration in Child Development and Family Studies courses are designed to reflect professional standards set forth by the National Association for the Education of Young Children (NAEYC). These standards are critical indicators of program quality.

In addition to core courses based on early childhood development, these guidelines contain course work designed to develop skills and knowledge of the historical, social, cultural, and educational contexts of the field.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

## General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

## Coordinated Study (48 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

## Child Development & Family Studies Core (21 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3) CDFS 4223 - Home/School/Comm Engage Credit Hours: (3) CDFS 4910 - Ethics in Early Care and Learning Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3)

### Family and Society (3 hours)

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) MRCH 4300 - Family Resource Management\*\* Credit Hours: (3) PSYC 4034 - Children Soc Relationships Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3)

### Counseling (3 hours)

COMM 4341 - Interpersonal Communication \*\* Credit Hours: (3) COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3)

### Historical Context (3 hours)

ANTH 3282 - American Communities \*\* Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) HIST 4831 - History American Family \*\* Credit Hours: (3) HIST 4851 - History of Women in America \*\* Credit Hours: (3) HIST 4853 - African American Women Credit Hours: (3) HIST 4863 - History/Childhood in America \*\* Credit Hours: (3)

### Social Services and Public Policy (6 hours)

PADM 3601 - Public Admin\*\* Credit Hours: (3)
PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3)
POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3)
SWRK 2911 - Soc Response to Human Need Credit Hours: (3)
SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3)
SWRK 4934 - Child Welfare Policy/Services Credit Hours: (3)
All SWRK courses require permit from the department.

### Educational Context (9 hours)

ART 3411 - Art for Children Credit Hours: (3) AUSP 4006 - Language & Speech Development Credit Hours: (3) CDFS 3420 - Play-Based Assessment for Young Children (0-4) Credit Hours: (3) CDFS 4101 - Int Curr for Early Learners Credit Hours: (3) ENGL 3401 - Children's Literature Credit Hours: (3) HLSC 3306 - Elementary School Health and Wellness Credit Hours: (2) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)

### Internship (3 hours)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (22-28 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## Professional Studies, Child Life Specialist (B.P.S.)

These guidelines for a Bachelor of Professional Studies with a concentration in Child Life Specialist are designed for persons seeking careers as child life specialists. Child life specialists are professionals who work closely with children and their families in hospitals and other settings to help them cope with the challenges of hospitalization, illness, and disability. Child life specialists provide children with age-appropriate preparation for medical procedures, pain management and coping strategies through a variety of different activities. Students must complete the application process as the field is highly selective.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

Prior to enrolling in any upper-division Child Life Specialist Concentration Courses, students must complete the following 6 hours of general education as required by the Association of Child Life Professionals (ACLP):

PSYC 1030 - General Psychology\*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

### Coordinated Study (59 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL

885

## Child Development & Family Studies Core (21 hours)

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3) CDFS 4223 - Home/School/Comm Engage Credit Hours: (3) CDFS 4910 - Ethics in Early Care and Learning Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3)

#### Declaring a concentration in Child Life Specialist

In order to pursue the Child Life Specialist concentration, students will review and sign a contract identifying the BPS requirements and the highly competitive expectations of a career in Child Life upon graduation.

Students applying for the Child Life Specialist program must have successfully completed or currently be enrolled in the courses below for consideration:

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) PSYC 1030 - General Psychology\*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

### Child Life Specialist Concentration (22 hours)

CDFS 4240 - Hospitalized Children and Their Families Credit Hours: (3)

CDFS 4260 - Child Life: Theory and Practice Credit Hours: (3)

CDFS 4300 - Play/Therapeutic Interventions Credit Hours: (4) w/Lab

CLAS 3021 - Medical Terminology Credit Hours: (3)

PSYC 4513 - Psychology of Grief/Loss Credit Hours: (3)

UNIV 2110 - Field Experience Credit Hours: (1-6) /Child Life Practicum (Note: this course should be taken at the end of your sophomore year)

Choose one of the following:

EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3) HCL 4010 - Healthcare Stats/Research \*\* Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3)

### Guided Electives & Practicum (16 hours)

Group A: Family Dynamics - (3 hours) ANTH 3511 - Culture/Kin/Family Credit Hours: (3) SOCI 3831 - Sociology of the Family\*\* Credit Hours: (3) UNIV 3535 - Family Communication\*\* Credit Hours: (3) Group B: Diverse Interactions - (3 hours) COUN 4621 - Human Interactions Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) Group C: Early Childhood - (3 hours) AUSP 4006 - Language & Speech Development Credit Hours: (3) CDFS 3420 - Play-Based Assessment for Young Children (0-4) Credit Hours: (3) ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \* EDPR 4301 - Early Child Dev/Begin Teacher Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

\*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

Group D: Educational Context - (3 hours) ART 3411 - Art for Children Credit Hours: (3) CDFS 4101 - Int Curr for Early Learners Credit Hours: (3) ENGL 3401 - Children's Literature Credit Hours: (3)

#### Group E: Field Experience (6 hours)

UNIV 4110 - Internship\*\* Credit Hours: (3-6)

You must complete a 600-hour unpaid internship under direct supervision of a Certified Child Life Specialist (CCLS). These Clinical Internships are highly competitive and can be completed outside of the city of Memphis at appropriate facilities. http://www.childlife.org/certification/students/requirements-after-2019. Apply early to guarantee an internship location.

If you are unable to complete this specific internship in your final two semesters, please contact your advisor to discuss an alternative plan for graduation outlined by the department.

#### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (25-31 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

### Professional Studies, Disability Studies and Rehabilitation Services, (B.P.S.)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Disability Studies and Rehabilitation Services are designed for students seeking to be academically and professionally grounded in issues faced by individuals seeking disability services. Students will also be exposed to the theme of employment – including vocational adjustment and appropriate job placement – and independent living outcomes as reaffirmed in the Rehabilitation Act Amendments of 1992. Rehabilitation depends heavily upon communication between both the consumer and professional and among various professionals; consequently, communication will be stressed, as well as an understanding of the potential influence of cultural diversity and individual lifestyle choices. Courses will also enable students to understand the methods used in disability services to solve consumer problems and utilize available resources. Finally, a well-supervised field experience component will provide students the opportunity to integrate classroom principles and develop entry-level skills in a work setting.

### General Education (35-41 hours)

See Graduation from the University for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (58 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Professional Core (19 hours)

COUN 4901 - Princ/Tech/Rehab Counseling Credit Hours: (3) COUN 4913 - Medical/Psyc Aspects/Rehab Credit Hours: (3) COUN 4921 - Vocational Dev/Occupation Info Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3) SWRK 3903 - Social Work Practice | Credit Hours: (4)

#### Choose one of the following:

SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Statistics and Research Methods (3 hours)

PSYC 3010 - Research and Statistics I \*\* Credit Hours: (4) SOCI 3311 - Social Statistics \*\* Credit Hours: (3) SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3)

#### Rehabilitation Delivery (12 hours)

COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) PADM 4207 - Health Politics/Policy Credit Hours: (3) PETE 3308 - Exceptional Learner Phys Ed Credit Hours: (3) PSYC 3512 - Health Psychology \*\* Credit Hours: (4) SLS 3905 - Leisure/Recr Disabilities Credit Hours: (3)

#### Management Services (9 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PADM 4227 - Issues/Nonprofit Admin Credit Hours: (3)

Communications (6 hours)

Group A: Professional Communications (3 hours)

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3)

Group B: Interpersonal Communications (3 hours)

COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3)

#### Development and Aging (6 hours)

EDPR 2111 - Development Across Lifespan Credit Hours: (3) HMSE 4305 - Problems/Health Sport Science Credit Hours: (1-3) LEAD 3350 - The Adult Learner Credit Hours: (3) SOCI 3112 - Contemporary Social Problems \*\* Credit Hours: (3) SOCI 4541 - Sociology of Aging Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3) SOCI 4852 - Sociology of Mental Illness Credit Hours: (3) UNIV 4527 - The Developing Adult \*\* Credit Hours: (3)

#### Internship (3 hours)

UNIV 4110 - Internship\*\* Credit Hours: (3-6)

#### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (12-18 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## **Professional Studies, Early Care and Learning, (B.P.S)**

The Early Care and Learning (ECL) concentration provides a foundation for a career in working with young children (0-4) in early care and education and other applied settings.

Students who choose the ECL concentration are expected to develop knowledge and skills in child development and learning, observation and assessment, pedagogy and research through classroom and field experiences. Students will be prepared for employment in a discipline working with children and families, and may pursue graduate training that leads to careers in education, academia, research, health professions, or social work. The online catalog can be accessed at: http://catalog.memphis.edu/index.php For information on careers in this and other disciplines students should consult the Career Services Office located on the 4th Wilder Tower, 678-2239.

889

This Program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (51 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate.

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at:

https://fcbeacad.memphis.edu/permits/.

### Child Development & Family Studies Core (21 hours)

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3) CDFS 4223 - Home/School/Comm Engage Credit Hours: (3) CDFS 4910 - Ethics in Early Care and Learning Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3)

#### Early Care and Learning Core (30 hours)

AUSP 4006 - Language & Speech Development Credit Hours: (3) CDFS 3410 - Soc Emotion Lrng Early Child Credit Hours: (3) CDFS 3420 - Play-Based Assessment for Young Children (0-4) Credit Hours: (3) CDFS 4101 - Int Curr for Early Learners Credit Hours: (3) CDFS 4230 - Math/Science Early Learning Credit Hours: (3) ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \* ICL 4001 - Teaching/Diverse Environment Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

\*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

### College Requirements (9 hours)

Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

890

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (19-28 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

Interested in becoming a Registered Behavior Technician (RBT)? An RBT is a designation that can be obtained with appropriate coursework and successful completion of a competency assessment. Most RBTs work under the supervision and guidance of a Board Certified Behavior Analyst (BCBA). Courses consist of a four-course sequence (SPED 4111, 4112, 4113, & 4114), and can be completed entirely online. These courses can be added to any UofM major. The coursework will cover the basics of applied behavior analysis, as well as how to effectively measure, assess, and intervene with children, including those with autism.

## **Professional Studies, Early Intervention Specialist, (B.P.S.)**

The Bachelor of Professional Studies with a concentration in Early Intervention (ages 0-2) focuses on recognizing the uniqueness of the provision of instruction and/or service coordination in the field of Part C the Federal IDEA legislation for early intervention (ages 0-2). Students will learn how to promote caregiver-child interaction by assisting families to adapt routines and activities to support children's (ages 0-2) learning and interaction. In addition, students will be introduced to adult learning approaches to support caregivers and understand how cultural diversity affects family interactions and practices.

This program is designed to reflect professional standards set forth by the Council for Exceptional Children Division of Early Childhood. These standards are critical indicators of program quality and include:

- · Federal IDEA Part C Requirements;
- · Typical and atypical patterns of infant and toddler development and learning in all areas;
- · Functional assessment of development across domains;
- · Developmental disabilities in the birth-to-three population; and
- · Specialized instructional strategies to help young children (ages 0-2) learn.

This program prepares students to take the Tennessee Early Intervention Credential exams required to provide Developmental Therapy in the State of Tennessee.

This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

#### Coordinated Study (58 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Child Development & Family Studies Core (21 hours)

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3) CDFS 4223 - Home/School/Comm Engage Credit Hours: (3) CDFS 4910 - Ethics in Early Care and Learning Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3)

#### Early Intervention Specialist (12 hours)

SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3) SPED 4111 - Intro/Appl Behav Analysis Credit Hours: (3) SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Early Intervention Specialist Core Supportive Competencies (12 hours)

CDFS 3420 - Play-Based Assessment for Young Children (0-4) Credit Hours: (3) ECED 4540 - Pln/Fclt Infant/Toddler Dev Credit Hours: (3) \* SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3) Requires dept. permit, SWRK 2010 or SWRK 2911 and BIOL 1010/BIOL 1011 UNIV 3535 - Family Communication\*\* Credit Hours: (3)

\*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

#### Guided Electives & Field Experience (13 hours)

#### Group A: Family Dynamics (3 hours)

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) LEAD 3350 - The Adult Learner Credit Hours: (3) SOCI 3831 - Sociology of the Family\*\* Credit Hours: (3) SWRK 3903 - Social Work Practice | Credit Hours: (4)

#### Group B: Diverse Interactions (3 hours)

AUSP 4006 - Language & Speech Development Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php SOCI 4442 - Sociology of Poverty Credit Hours: (3)

#### Group C: Educational Context (3 hours)

CDFS 4101 - Int Curr for Early Learners **Credit Hours:** (3) ENGL 3401 - Children's Literature **Credit Hours:** (3) SPED 3410 - Disorders of Language **Credit Hours:** (3) SWRK 4937 - School Social Work **Credit Hours:** (3)

#### Group D: Field Experience: (4hours)

UNIV 4110 - Internship\*\* Credit Hours: (3-6)

#### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (12-18)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

Interested in becoming a Registered Behavior Technician (RBT)? An RBT is a designation that can be obtained with appropriate coursework and successful completion of a competency assessment. Most RBTs work under the supervision and guidance of a Board Certified Behavior Analyst (BCBA). Courses consist of a four-course sequence (SPED 4111, 4112, 4113, & 4114), and can be completed entirely online. These courses can be added to any UofM major. The coursework will cover the basics of applied behavior analysis, as well as how to effectively measure, assess, and intervene with children, including those with autism.

## Professional Studies, Emergency Management, (B.P.S.)

The interdisciplinary Emergency Management concentration is designed for students with a diversity of backgrounds and interest in applying that background to emergency management, community resilience to disaster, environmental hazards mitigation, emergency management response, and business continuity/disaster recovery. It will address the following critical knowledge elements: a) the physical and social dimensions of disasters through combining knowledge from various physical, social, and applied disciplines, b) the intersection of public policy to disaster risk, response, and mitigation, c) the intersection of the private, nonprofit, and governmental sectors and how this effects emergency preparedness, mitigation, and recovery, d) sustainable development, planning for and response to extreme events and change in our physical and human landscapes; and e) communication dynamics and persuasive communication in emergencies.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

893

### Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Professional Core (12 hours)

EMGT 3100 - Seminar in Emergency Management Credit Hours: (3)

Choose one of the following: EMGT 4000 - Internship Credit Hours: (3) \* CJUS 4100 - Ind Dir Studies Credit Hours: (1-6) ESCI 4621 - Investigations In GEOG Credit Hours: (1-3)

#### Choose 6 hours from the following:

CJUS 4126 - CJUS Admin and Mgmt Credit Hours: (3) ESCI 4261 - Plan Sustainable Cities/Region Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) \*NOTE: Junior level status required. PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 3611 - Disaster Planning/Control Credit Hours: (3) PADM 3615 - Community Risk Reduction Credit Hours: (3)

#### Hazard/Risk Management (9 hours)

ARCH 4451 - Site/Environmental Planning Credit Hours: (3) CJUS 4190 - Terrorism Soc/Legl Prsp \*\* Credit Hours: (3) ESCI 4251 - Environmental Hazards Credit Hours: (3) ESCI 3131 - Severe Weather Credit Hours: (3) COMM 4211 - Public Health Campaigns

#### Human Systems (9 hours)

ANTH 4511 - Medical Anthropology Credit Hours: (3) COMM 3322 - Theories of Persuasion \*\* Credit Hours: (3)

COMM 4380 - Communication and Conflict \*\* Credit Hours: (3) Or COMM 4410 - Conflict Resolution and Negot\*\* Credit Hours: (3)

PADM 4207 - Health Politics/Policy Credit Hours: (3) PADM 4221 - Issues/Urban Admin Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3701 - Individual and Society \*\* Credit Hours: (3) CJUS 3129 - Statistical Methods/CJUS Credit Hours: (4) ESCI 4515 - Geographic Info Science Credit Hours: (3) ESCI 4521 - Quantitative Methods Credit Hours: (3) PADM 4101 - Political Statistics Credit Hours: (3) POLS 4101 - Political Statistics \*\* Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3)

## College Requirements (9 hours)

### Thematic Studies (6 hours)

Any UNIV 3500-3599 or UNIV 4500-4599 course, CSED 4300, CSED 4205, PHIL 3514 Students complete a total of 6 credit hours in a College of Professional & Liberal Studies thematic studies course(s) of their choosing. These courses are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Only specifically designated courses will meet this requirement. Students can complete one 6 credit hour class or two 3 credit hour courses. For a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

## Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on the topic they select.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (35-41 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## **Professional Studies, Fashion Design, (B.P.S)**

The Fashion Design concentration prepares students for careers in Fashion Design for the Apparel Industry. The curriculum fosters creative expression in all aspects of Fashion Design, including fashion sketching, creative design, computer applications, draping, and pattern drafting. With this, students learn to balance hand-making and digital skills with an integrated approach to design. The concentration is structured to challenge and inspire students by incorporating artistic, technical, and theoretical elements into a realistic approach to the Fashion Design Industry.

## General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

## Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL

3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

895

#### Merchandising and Design Core (15 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising Credit Hours: (3) MRCH 2010 - Textiles Credit Hours: (3) MRCH 2300 - Contemporary Design Mavens and Influencers Credit Hours: (3) MRCH 3000 - Color and Basic Design Studies and Applications Credit Hours: (3) MRCH 3215 - Textiles Applications Credit Hours: (3)

#### Fashion Design Concentration (24 hours)

MRCH 2005 - Introd to the Fashion Industry Credit Hours: (3) MRCH 2200 - Fashion Sketching and Illustration for Design Credit Hours: (3) MRCH 3075 - Basic Industry Sewing and Construction Credit Hours: (3) MRCH 3100 - Pattern Drafting I Credit Hours: (3) MRCH 3300 - Draping Techniques Credit Hours: (3) MRCH 3400 - Computer Aided Fashion Drawing and Design Credit Hours: (3) MRCH 3450 - Computer Patternmaking Credit Hours: (3) MRCH 4000 - Advanced Sewing Techniques Credit Hours: (3) MRCH 4000 - Pattern Drafting II Credit Hours: (3) MRCH 4501 - Fashion Sketching and Illustration for Design II/Collections Credit Hours: (3) MRCH 4550 - Design and Fit Analysis Credit Hours: (3) MRCH 4575 - Sourcing and Technical Design Credit Hours: (3)

#### Guided Electives (18 hours)

Choose any remaining courses not taken from Fashion Design Concentration or appropriate upper division courses from Art, Theater, etc. Courses from other departments should be discussed with your advisor/program coordinator before registering to determine appropriateness.

#### Senior Year Requirements (6 hours)

MRCH 4600 - Senior Seminar Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

#### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

**REQUIRED FOR CONCENTRATION:** MRCH 4205 - Behavioral Sci Aspects Clothng Credit Hours: (3) MRCH 3050 - Costume History Credit Hours: (3)

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

#### General Electives (7-13 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

### **Professional Studies, Fashion Merchandising (B.P.S.)**

Industry overview, financial planning and purchasing, visual presentation, color selection and coordination, textile identification, clothing characteristics, entrepreneurship and personal and professional development are all program components in this concentration.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Merchandising and Design Core (15 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising Credit Hours: (3) MRCH 2010 - Textiles Credit Hours: (3) MRCH 2300 - Contemporary Design Mavens and Influencers Credit Hours: (3) MRCH 3000 - Color and Basic Design Studies and Applications Credit Hours: (3) MRCH 3215 - Textiles Applications Credit Hours: (3)

### Fashion Merchandising Concentration (24 hours)

MRCH 2004 - Tech Skills for Merchandising Credit Hours: (3) MRCH 2005 - Introd to the Fashion Industry Credit Hours: (3) MRCH 2106 - 3D Visual Merchandising Credit Hours: (3) MRCH 3206 - Merchandising Systems and Applications Credit Hours: (3) MRCH 3600 - Consumer Engagement in the Digital Era Credit Hours: (3) MRCH 3650 - Merchandise Buying Credit Hours: (3) MRCH 4560 - Trend Analysis and Styling Concepts Credit Hours: (3) MRCH 4575 - Sourcing and Technical Design Credit Hours: (3)

#### Required Minor (18 hours)

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) Choose six hours from the courses below:

MKTG 3320 - Retailing Management \*\* Credit Hours: (3) MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4230 - Services Marketing Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) MKTG 4550 - MKTG Business Solutions for Sustainability Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) SCMS 4620 - Logistics Management Credit Hours: (3)

#### Senior Year Requirements (6 hours)

```
MRCH 4600 - Senior Seminar Credit Hours: (3)
UNIV 4110 - Internship** Credit Hours: (3-6)
```

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

MRCH 3050 - Costume History Credit Hours: (3) MRCH 4205 - Behavioral Sci Aspects Clothng Credit Hours: (3)

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (7-13 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 uppder division hours.

## **Professional Studies, Health Services (B.P.S.)**

Students following guidelines for Health Services concentration are interested in the helping professions. This curriculum will prepare students for a wide range of health care positions in hospitals, health departments, health agencies, research facilities, schools and industry. This concentration is also for experienced health care professionals who have completed non-baccalaureate programs in health care specialties such as medical laboratory technology, respiratory therapy, radiological technology, and nursing who will build upon their training and experience by taking courses in such areas business practice, interpersonal skills, policy, risk management, social context of health care, and financial management.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (48 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Professional Core (27 hours)

Group A: Administration & Supervision (3 hours) HCL 3000 - Healthcare Leadership \*\* Credit Hours: (3) HETH 4211 - Comm Healtcare Lead/Mgmt\*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)

Group B: Human Resources Management (3 hours) HCL 4030 - Healthcare Human Resources \*\* Credit Hours: (3) MGMT 3030 - Mgmt/Service Organizatn\*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3)

#### Group C: Financial (3 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 1220 - Personal Financial Management Credit Hours: (3) HCL 3010 - Healthcare Financial Mgmt \*\* Credit Hours: (3) MRCH 4300 - Family Resource Management\*\* Credit Hours: (3)

Group D: Professional Writing (3 hours) ENGL 3134 - Computer/Writing/Lit\*\* Credit Hours: (3) ENGL 3250 - Professional Comm\*\* Credit Hours: (3) ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) HCL 3050 - Prof Writing Healthcare \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3)

#### Group E: Research Methods (3 hours)

HCL 4010 - Healthcare Stats/Research \*\* Credit Hours: (3) HETH 4210 - Healthcare Research Methods\*\* Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3) SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3)

Group F: Health Communication (3 hours) COMM 3012 - Health Communication \*\* Credit Hours: (3) COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4016 - Public Health Campaigns Credit Hours: (3) COMM 4410 - Conflict Resolution and Negot\*\* Credit Hours: (3) HCL 3020 - Healthcare Informatics \*\* Credit Hours: (3)

Group G: Policy and Social Context (3 hours) HCL 4000 - Health Policy Issues \*\* Credit Hours: (3) HCL 4020 - Law/Ethics of Healthcare \*\* Credit Hours: (3) HETH 4212 - Trends/Issues in Healthcare\*\* Credit Hours: (3) HLSC 4530 - Epidemiology \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3)

Group H: Health Care Systems (3 hours) COMM 4015 - Health Literacy Credit Hours: (3) COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) HCL 3040 - U S Health System \*\* Credit Hours: (3) HETH 4213 - Community Health/Iss/Serv\*\* Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3)

Group I: Special Populations (3 hours) ANTH 4571 - Race and Health Disparities Credit Hours: (3) AUSP 1010 - Intro Amer Sign Lang | Credit Hours: (3) AUSP 1020 - Intro Amer Sign Language II Credit Hours: (3) AUSP 4206 - Deaf Culture and Deaf History Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) HLSC 4100 - Health and Aging Credit Hours: (3) HLSC 4300 - Individuals with Disabilities and Special Needs Credit Hours: (3) SLS 3905 - Leisure/Recr Disabilities Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)

### Health Care Specialty Guided Elective (21 hours)

NOTE: Must have 12 hours of Upper Division courses from this section.

CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) COBH 4707 - International Health/Prob/Iss\*\* Credit Hours: (3) HCL 3020 - Healthcare Informatics \*\* Credit Hours: (3) HCL 3030 - Healthcare Strategic Plan/Mktg \*\* Credit Hours: (3) HCL 3040 - U S Health System \*\* Credit Hours: (3) HCL 4020 - Law/Ethics of Healthcare \*\* Credit Hours: (3) HCL 4040 - Business Principles/Healthcare \*\* Credit Hours: (3) HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3) HMSE 2102 - ARC First Aid and CPR Credit Hours: (3) LEGL 4200 - Healthcare Liability Credit Hours: (3) NUTR 2202 - Nutrition \*\* Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) PSYC 3512 - Health Psychology \*\* Credit Hours: (4) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3) SW 3170 - Family Caregiving\*\* Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

900

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (22-28 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

## **Professional Studies, Human Services, (B.P.S.)**

Students in the Human Services concentration are expected to develop a philosophical orientation to the human condition; to enlarge their understanding of social structures, values and norms; to study human growth and development; and to become informed about social change and social and bureaucratic organizations. Students in the Human Services concentration will take courses from such departments as Counseling and Personnel Services, Sociology and Social Work, Psychology, Management, and Special Education.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

## Coordinated Study (45 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Basic Core (12 hours)

COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3) SWRK 2911 - Soc Response to Human Need Credit Hours: (3)

#### Professional Writing (3 hours)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3)

#### Rehabilitation/Social Intervention (6 hours)

CJUS 4152 - Drug Misuse and Abuse Credit Hours: (3) COBH 4707 - International Health/Prob/Iss\*\* Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) COUN 4901 - Princ/Tech/Rehab Counseling Credit Hours: (3) COUN 4913 - Medical/Psyc Aspects/Rehab Credit Hours: (3) COUN 4921 - Vocational Dev/Occupation Info Credit Hours: (3) HETH 4212 - Trends/Issues in Healthcare\*\* Credit Hours: (3) HETH 4213 - Community Health/Iss/Serv\*\* Credit Hours: (3) SLS 3905 - Leisure/Recr Disabilities Credit Hours: (3) SOCI 4852 - Sociology of Mental Illness Credit Hours: (3) SW 3170 - Family Caregiving\*\* Credit Hours: (3) SWRK 3920 - Soc Welfare Policy/Programs Credit Hours: (3) UNIV 3534 - Theatre & Therapy Credit Hours: (3)

#### Support Courses (21 hours)

ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4410 - Conflict Resolution and Negot\*\* Credit Hours: (3) CRMJ 4520 - Patterns of Domestic Abuse\*\* Credit Hours: (3) CRMJ 4530 - Sociology of Murder\*\* Credit Hours: (3) EDPR 3302 - Child/Adolescent Development Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PSYC 3102 - Abnormal Psychology Credit Hours: (3) PSYC 3103 - Child Psychology \*\* Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3501 - Sociology of Deviant Behavior \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4541 - Sociology of Aging Credit Hours: (3) SOCI 4852 - Sociology of Mental Illness Credit Hours: (3) UNIV 4527 - The Developing Adult \*\* Credit Hours: (3)

#### Internship (3 hours)

UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: For a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (Completed during the final semester)

### General Electives (25-31 hours)

### **Professional Studies, Information Technology (B.P.S.)**

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in Information Technology can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of and fundamentals of administrative leadership in the technological fields; (2) to allow students to reflect upon national and international technological development and communication and the significant social and cultural issues raised in those contexts; and (3) to promote skills in information systems, statistical methods, formal and interpersonal communication, including team and organizational relations.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Professional Core (21 hours)

Group A. Administration and Supervision (3 hours) MGMT 3610 - Princ Mgmt/Organ Behav\*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) Group B. Organizational Systems (3 hours) PM 4120 - Organization Theory and Behav\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) Group C. Statistical Methods (3 hours) PBRL 4410 - Public Relations Research Credit Hours: (3) SOAA 3350 - Social Statistics\*\* Credit Hours: (3) SOCI 4510 - Intro to Social Research\*\* Credit Hours: (3) Group D. Written Communications (3 hours) ENGL 3134 - Computer/Writing/Lit\*\* Credit Hours: (3) ENGL 3250 - Professional Comm\*\* Credit Hours: (3) PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3) Group E. Team & Organizational Relations (3 hours) COMM 3010 - Integrated Corp Comm\*\* Credit Hours: (3) COMM 4410 - Conflict Resolution and Negot\*\* Credit Hours: (3) ORCO 3240 - Organizational Comm\*\* Credit Hours: (3) Group F. International Context (3 hours) JOUR 4712 - Media and Cultures\*\* Credit Hours: (3) POLI 4350 - International Law\*\* Credit Hours: (3) PS 3510 - Internl Political Economy\*\* Credit Hours: (3) POLS 3010 - Comparative Politics\*\* Credit Hours: (3) SPAN 3550 - Latin America Country & People\*\* Credit Hours: (3)

### Information Technology Concentration (15 hours)

Group A: Management Information Systems Overview (3 hours) MGMT 3220 - Mgmt of Info Systems\*\* Credit Hours: (3) PTMA 3020 - Managing Information Tech\*\* Credit Hours: (3) Group B: Software (3 hours) UNIV 4706 - Managing Software Development\*\* Credit Hours: (3) Group C: Files/Operativng Systems (3 hours) COMP 3050 - Programming Languages\*\* Credit Hours: (3) INFS 3700 - Systems Analysis and Design\*\* Credit Hours: (3) Group D: Database Management (3 hours) CSCI 3222 - Database Mgmt System\*\* Credit Hours: (3) UNIV 4708 - Business Intelligence\*\* Credit Hours: (3) Group E: Networks (3 hours) CSCI 4017 - Intro to Information Assurance\*\* Credit Hours: (3) INFS 4900 - Business Data Communications\*\* Credit Hours: (3)

# College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Elective (34-40 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, International Organizational Leadership (B.P.S.)

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in International Organizational Leadership can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of bureaucratic organizations and the fundamentals of administrative leadership; (2) to allow students to reflect upon national and international organizational context and upon significant social and cultural issues raised in those contexts; and (3) to promote skills in formal and interpersonal communication, including sensitivity to international issues and cultural diversity that have an impact upon the quality of work.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

904

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

## Professional Core and Organizational Leadership Concentration (36 hrs)

**Professional Core (21 hours)** A. Administration and Supervision (3 hours) PADM 3601 - Public Admin\*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) MGMT 3610 - Princ Mgmt/Organ Behav\*\* Credit Hours: (3) B. Organizational Systems (3 hours) PM 4120 - Organization Theory and Behav\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) C. Statistical Methods (3 hours) PBRL 4410 - Public Relations Research Credit Hours: (3) SOAA 3350 - Social Statistics\*\* Credit Hours: (3) SOCI 4510 - Intro to Social Research\*\* Credit Hours: (3) D. Written Communications (6 hours) ENGL 3134 - Computer/Writing/Lit\*\* Credit Hours: (3) ENGL 3250 - Professional Comm\*\* Credit Hours: (3) PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3) E. Team & Organizational Relations (3 hours) COMM 3010 - Integrated Corp Comm\*\* Credit Hours: (3) ORCO 3240 - Organizational Comm\*\* Credit Hours: (3) F. International Context (3 hours) JOUR 4712 - Media and Cultures\*\* Credit Hours: (3) POLI 4350 - International Law\*\* Credit Hours: (3) PS 3510 - InternI Political Economy\*\* Credit Hours: (3) POLS 3010 - Comparative Politics\*\* Credit Hours: (3) SPAN 3550 - Latin America Country & People\*\* Credit Hours: (3)

International Organizational Leadership Concentration(15 hours) BMGT 3600 - International Mgmt\*\* Credit Hours: (3) POLI 4350 International Law PS 3510 International Political Economy POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3) COMM 3560 - Intercultural Communtn\*\* Credit Hours: (3)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

### General Electives (34-40 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

### Professional Studies, Law Enforcement Administration, (B.P.S)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Law Enforcement Administration are designed for experienced law enforcement professionals who wish to further their careers by completing a program of study designed to increase their skills in management, organizational relations, and communication; their knowledge of the contexts within which law enforcement administration fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce. In most cases, candidates for this degree program will be active duty or retired law enforcement officers at the municipal, county, or state levels, though military police and, in certain circumstances, those whose experience is in private security are eligible as well.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (58 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

CJUS 1100 is a prerequisite for all other CJUS classes.

#### Organization and Administration Required Core (12 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3) \*

Pick 1: CJUS 4126 - CJUS Admin and Mgmt Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3)

#### Team Work and Organizational Relations (6 hours)

COMM 3342 - Communication and Leadership Credit Hours: (3) COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) LEGL 3482 - Labor Law Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3)

#### Written Communication (3 hours)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3)

Decision-Making (6 hours)

#### Group A: (3 hours)

CJUS 3129 - Statistical Methods/CJUS Credit Hours: (4) POLS 4101 - Political Statistics \*\* Credit Hours: (3) /PADM 4101 (cross listed) SOCI 3311 - Social Statistics \*\* Credit Hours: (3)

#### Group B: (3 hours)

CJA 3230 - Police Org/Admin Credit Hours: (3) CJUS 3130 - Research Methods CJUS \*\* Credit Hours: (3) \* SOCI 3322 - Methods of Social Research \*\* Credit Hours: (3)

#### Professional Ethics (3 hours)

CJUS 4130 - Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3) LEGL 2400 - Legal Ethics Credit Hours: (3) PHIL 3511 - Ethical Theory Credit Hours: (3) UNIV 3540 - Ethics & Professionalism \*\* Credit Hours: (3)

#### Urban Issues (6 hours)

```
ANTH 4411 - Urban Anthropology Credit Hours: (3)
ANTH 4412 - Neighborhood Development Credit Hours: (3)
ESCI 3451 - Intro/Urban Planning Credit Hours: (3)
POLS 4222 - Urban Politics Credit Hours: (3)
SOCI 3112 - Contemporary Social Problems ** Credit Hours: (3)
SOCI 4631 - Cities in Change Credit Hours: (3)
```

#### Public Policy Issues (6 hours)

CJUS 3226 - Police in America \*\* Credit Hours: (3) LEGL 3487 - Admin Law/Procedure Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) SOCI 4842 - Sociology/Occup/Professions Credit Hours: (3)

#### Social Issues (3 Hours)

COMM 4373 - Interracial Communication\*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4460 - Black/White Women in South Credit Hours: (3)

#### Behavioral Issues (3 hours)

CJUS 3540 - Criminology Credit Hours: (3) PSYC 3102 - Abnormal Psychology Credit Hours: (3) PSYC 3106 - Social Psychology \*\* Credit Hours: (4) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4) A minimum of 10 hours of pre assessed experiential learning work from a POST certified training academy or Military MP training will be accepted with proper documentation. The 10 hours will be applied to the Coordinated Study.

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (12-17 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Legal Studies, (B.P.S.)

The Legal Studies concentration teaches theoretical and practical aspects of the field of law as a profession. Students are equipped to offer substantive legal support services to firms and agencies or to continue their education in law school. The core curriculum emphasizes four correlated disciplines: (1) theory, process, application, and ethics of law; (2) legal and administrative research and investigation; (3) law-related technologies, and (4) professional decorum and communication skills. Only licensed attorneys are permitted to practice law, but well-trained paralegals and support staff are indispensable to any office that faces critical issues in law, regulatory compliance, or policy. The unique skill sets of Legal Studies graduates are vital not only to law firms but also to corporations, government agencies, courts, law enforcement, health care organizations, non-profits, educational institutions, and a wide range of other professional settings.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL

No more than 15 hours of the Legal Studies Professional Core may be satisfied through transfer credit.

#### Legal Studies Professional Core (30 hours)

LEGL 2400 - Legal Ethics Credit Hours: (3) LEGL 2410 - Intro to Law Credit Hours: (3) LEGL 3150 - Legal Research/Writing I Credit Hours: (3) \* LEGL 3410 - Contracts Commercial Law Credit Hours: (3) LEGL 3420 - Torts Credit Hours: (3) LEGL 3440 - Civil Procedure Credit Hours: (3) LEGL 3484 - Bankruptcy Practices Credit Hours: (3) LEGL 3486 - Criminal Law & Procedure Credit Hours: (3) LEGL 4150 - Legal Research Writing II Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6) \*\*

#### Note

\* Students must complete LEGL 2400, LEGL 2410, and LEGL 3150 with a grade of C- or better before enrolling in any upper division (3000-4000 level) LEGL courses.

\*\* A permit is required to enroll in UNIV 4110 - Internship\*\*. The program coordinator approves internships and issues permits. In order to be eligible, students must have earned (1) ninety credit-hours and (2) a grade of C- or better in both LEGL 3150 - Legal Research/Writing I and LEGL 4150 - Legal Research Writing II. The internship requires students to perform 150 clock-hours of substantive legal work within a professional legal environment. Although the academic advisors and the program coordinator are available to assist however possible, it is each student's responsibility to find, apply for, and secure his/her own internship prior to seeking a permit for UNIV 4110. Students cannot transfer credit for internships from other schools or programs unless the student and the internship both meet UM's Legal Internship standards, as determined by the program coordinator. For more information and related forms and documents, please visit

https://www.memphis.edu/cpls/pdfs/UNIV4110\_Legal\_Studies\_Internship\_Packet.pdf.

#### Law-Related Electives (12 hours)

- LEGL 3400 Estates and Probates Credit Hours: (3)
- LEGL 3430 Business Associations Credit Hours: (3)
- LEGL 3481 Family Law Credit Hours: (3)
- LEGL 3482 Labor Law Credit Hours: (3)
- LEGL 3485 Real Estate Practices Credit Hours: (3)
- LEGL 3487 Admin Law/Procedure Credit Hours: (3)
- LEGL 4000 Evidence and Argument Credit Hours: (3)
- LEGL 4200 Healthcare Liability Credit Hours: (3)
- LEGL 4300 Immigration Law Credit Hours: (3)
- POLS 4709 Mock Trial Credit Hours: (3-6) \*

#### Note

\*Mock trial is a specialty course offered by the Political Science Department. It is limited to students who audition and are selected for the UM Mock Trial team, which sometimes travels for regional competitions. Eligible students may take the course twice for a total of six credit hours, but only in consecutive semesters (fall and then spring). For more information on permits, auditions, requirements, and offerings, please contact the Political Science Department.

#### Interdisciplinary Electives (12 hours)

Legal Studies students must also take at least 12 hours (four classes) of Interdisciplinary Electives. This course group is meant to offer students the freedom to shape their own learning experience while still adhering to a central theme of modern legal systems in society.

Students seeking to enroll in courses outside the College of Professional & Liberal Studies must obtain the appropriate permits from the department offering the course. Note that **all** upper-division courses offered by the Fogelman College of Business and Economics require a permit (3000 or 4000-level ACCT, ECON, FIR, MGMT, MKTG). To request a permit for courses at Fogelman College, please visit fcbeacad.memphis.edu/ugad/permits. Many upper-division courses in other departments also have prerequisites or permit restrictions. Students are responsible for knowing and satisfying all course requirements prior to enrollment. For specific information about course descriptions and prerequisites, please see the Undergraduate Catalog, which is available online at Courses-Undergraduate.

909

ACCT 3011 - Business Law \*\* Credit Hours: (3) CJUS 3426 - Corrections in America \*\* Credit Hours: (3) CJUS 3510 - Law and Society Credit Hours: (3) CJUS 3521 - Constitutional Crmnl Procedure \*\* Credit Hours: (3) CJUS 4130 - Ethical Dilemmas in Criminology and Criminal Justice Credit Hours: (3) CJUS 4170 - Prevention/Deterrence Crime Credit Hours: (3) CJUS 4520 - Criminal Law Credit Hours: (3) CJUS 4531 - Constitutional Law Credit Hours: (3) FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 4011 - Retirement and Estate Planning Credit Hours: (3) FIR 4310 - Real Estate Law \*\* Credit Hours: (3) \* HIST 3840 - U S Constitutional History Credit Hours: (3) JRSM 4700 - Media Law \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4221 - Issues/Urban Admin Credit Hours: (3) PHIL 3411 - Contemporary Moral Problems \*\* Credit Hours: (3) PHIL 3511 - Ethical Theory Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) PHIL 4551 - Social and Political Philosophy Credit Hours: (3) POLS 3402 - Legal/Political Thght Modern Credit Hours: (3) POLS 4200 - Envrnmntl Law/Policy/Regulatn Credit Hours: (3) POLS 4211 - Const Law/National Powers Credit Hours: (3) POLS 4212 - Const Law Civil Liberty \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4405 - Origin/Dev Amer Pol Thought \*\* Credit Hours: (3) POLS 4415 - African-Am Pol Thght to 1900 Credit Hours: (3) POLS 4416 - African-Am Pol Tht from 1900 Credit Hours: (3) POLS 4504 - International Law Credit Hours: (3) SOCI 3541 - Criminology Credit Hours: (3)

\*Legal Studies Students may receive degree credit for either LEGL 3485 - Real Estate Practices or FIR 4310 - Real Estate Law \*\*, but not both.

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

Please note that the Legal Studies Senior Project does not involve the same materials and assignments as the Senior Project for students in other fields of study. Instead of an academic research paper, Legal Studies students analyze a case file and conduct independent legal research to draft a full-length trial brief that is suitable for attorney signature and filing with the court. For more information about the Legal Studies section of Senior Project, please email legalstudies@memphis.edu. For permit and registration information, please contact your academic advisor or the Senior Project Coordinator.

910

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (16-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Manufacturing Technology Management, (Lambuth Campus Only) (B.P.S)

The Bachelor of Professional Studies degree (BPS) with a concentration in Manufacturing Technology Management offers career and advancement opportunities in the manufacturing industry.

The interdisciplinary focus on manufacturing supervisory skills will assist students in advancing their manufacturing careers for those already working in the industry.

Students will learn skills in project planning and evaluation, work design improvement, production control, facility design, occupational safety, and statistical quality control. In addition, they will learn principles of supervision and other management skills.

Those currently in the industry also have the opportunity to use existing work experience for college credit through Experiential Learning Credit.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Manufacturing Technology Concentration (27 hours)

TECH 3386 - Occupational Safety Credit Hours: (3) TECH 3440 - Project Plan/Cost Evaluation Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) TECH 4460 - Work Design/Improvement Credit Hours: (3) TECH 4462 - Quality Improvement Credit Hours: (3) TECH 4464 - Production Control Systems Credit Hours: (3) TECH 4466 - Facility Design Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6) (6)

#### Management Services (27 hours)

#### Administration and Supervision (3 hours)

MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3)

#### Organizational Systems (3 hours)

MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PSYC 3508 - Indust/Organizatnl Psyc Credit Hours: (3)

#### Marketing and Public Relations (3 hours)

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3)

#### Team and Organizational Relations (3 hours)

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3)

#### Written Communication (3 hours)

```
ENGL 3601 - Technical and Profess Writing ** Credit Hours: (3)
ENGL 3602 - Professional Editing ** Credit Hours: (3)
ENGL 3603 - Engineering Communications Credit Hours: (3)
ENGL 3604 - Persuasive Writing ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
PBRL 3421 - Public Relations Writing ** Credit Hours: (3)
```

#### Social & Cultural Context (3 hours)

CJUS 4180 - Corporate/White Collar Crime \*\* Credit Hours: (3) COMM 3003 - Television and Culture\*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 3831 - Sociology of the Family\*\* Credit Hours: (3)

#### Political & Economic Context (3 hours)

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) HIST 4824 - Business History Credit Hours: (3) POLS 4508 - Theories Internatl Relations\*\* Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3)

#### Technology & Culture (3 hours)

COMM 4014 - Communication on the Internet \*\* Credit Hours: (3) HIST 3035 - Technology/Culture Am History\*\* Credit Hours: (3) JRSM 3900 - Visual Media \*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### Electives (16-22 Hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Music & Entertainment (Lambuth Campus Only), (B.P.S)

The Music and Entertainment (ME) concentration is an interdisciplinary program fusing three areas of study: music, business, and technology. This concentration will provide students an understanding of fundamentals in commercial music and will provide them the knowledge to gain employment in the entertainment field.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (55 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Music Core (19 hours)

MUTC 3701 - Theory/Musicianship I Credit Hours: (3) \* MUTC 3702 - Theory/Musicianship II Credit Hours: (3) \* MUS 1030 - Introduction to Music\*\* Credit Hours: (3) MUHL 3303 - Western Music History Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUAP elective-Ensemble or Applied (4 hours)

\*These courses have been approved only for Lambuth Campus.

## Entertainment Core (18 hours)

MUID 3704 - Recording Studio Tech/Practice Credit Hours: (3) MUID 3705 - Cont Sngwrting/Prod Techniques Credit Hours: (3) MUID 4201 - Studies in Commercial Music Credit Hours: (1-3) \* MUID 4701 - Music Licensing/Publishing Credit Hours: (3) \* COMM/MUID/UNIV Elective in Entertainment UNIV 4110 - Internship\*\* Credit Hours: (3-6) (1-6 hours) \*These courses have been approved only for Lambuth Campus.

# Business Core (18 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3) Elective- 3 hours Business/Marketing/Mgmt Elective (Upper Division)

Choose one: PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3) ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (15-21 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Non-Profit Development and Administration, (B.P.S.)

The goal of this concentration's interdisciplinary curriculum is to help persons understand the role of nonprofit in society and to prepare them to organize, develop, and administer nonprofit organizations. Nonprofit organizations include educational, scientific, religious, and other charitable organizations as well as private foundations, community-based organizations, professional and fraternal associations, and civic and social organizations. The guidelines are designed to serve persons who have worked, or who want to work, within the nonprofit sector as employees, or have served in the community as volunteers. They will want to learn how nonprofit organizations serve the community, to learn about their operation, and their constituencies, and to improve or develop administrative skills in order to work in the nonprofit sector. Persons who wish to enter the nonprofit sector or make a career change will also be served by these guidelines. Graduates of the program will likely enter such careers as communications director, volunteer director, or program director for a nonprofit agency. This curriculum can also prepare for graduate study in master's degree programs in the fields of public administration, applied anthropology, business administration and social work.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (60 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Core Courses (15 hours)

ANTH 4412 - Neighborhood Development Credit Hours: (3) or ANTH 3282 - American Communities \*\* Credit Hours: (3)

ECON 3411 - Economics of Social Issues MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3)

### Historical Context (3 hours)

HIST 3274 - Islamic History since 1405 Credit Hours: (3) HIST 3275 - History of Jewish People Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) HIST 4831 - History American Family \*\* Credit Hours: (3) HIST 4851 - History of Women in America \*\* Credit Hours: (3) HIST 4863 - History/Childhood in America \*\* Credit Hours: (3) HIST 4871 - U S Urban History Credit Hours: (3)

Social, Political, Economic Context (6 hours)

#### Choose 2 courses from at least two different disciplines:

ANTH 4411 - Urban Anthropology Credit Hours: (3) CJUS 1100 - Intro/Criminal Justice \*\* Credit Hours: (3) COMM 4381 - Senior Capstone \*\* Credit Hours: (3) COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) PHIL 3511 - Ethical Theory Credit Hours: (3) POLS 3211 - State/Local Government Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) POLS 4222 - Urban Politics Credit Hours: (3) POLS 4223 - Issues/Urban Politics Credit Hours: (3) SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4541 - Sociology of Aging Credit Hours: (3)

#### Nonprofit Work Setting (3 hours)

ESCI 3451 - Intro/Urban Planning Credit Hours: (3) PADM 4221 - Issues/Urban Admin Credit Hours: (3) SLS 3103 - Outdoor Rec/Ed Urban America \*\* Credit Hours: (3) SLS 3205 - Venue Planning and Management Credit Hours: (3) SLS 3905 - Leisure/Recr Disabilities Credit Hours: (3) SOCI 3860 - Sociology of Religion\*\* Credit Hours: (3)

#### Skills for Administration & Community Development (21 Hours)

#### Marketing & Fund-raising (3 hours)

FIR 4011 - Retirement and Estate Planning Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 4230 - Services Marketing Credit Hours: (3)

#### Human Resources (3 hours)

COUN 4621 - Human Interactions Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) SLS 3204 - Org Analysis Sport/Leisure \*\* Credit Hours: (3)

#### Program Evaluation (3 hours)

ANTH 4010 - Ethnographic Methods **Credit Hours:** (3) COMM 3330 - Communication Research Methods **\*\* Credit Hours:** (4) PADM 4101 - Political Statistics **Credit Hours:** (3) SLS 3305 - Leisure/Recreation Prog Devlp **\*\* Credit Hours:** (3) SOCI 3311 - Social Statistics **\*\* Credit Hours:** (3) SOCI 3322 - Methods of Social Research **\*\* Credit Hours:** (3)

#### Accounting (3 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ACCT 3310 - Cost Accounting \*\* Credit Hours: (3) ACCT 4540 - Govt/Health/Non-Profit Credit Hours: (3) PADM 4227 - Issues/Nonprofit Admin Credit Hours: (3) SLS 3605 - Financial Management SLS \*\* Credit Hours: (3) ACCT 3011 - Business Law \*\* Credit Hours: (3) LEGL 2410 - Intro to Law Credit Hours: (3) POLS 3405 - Intro Law/Jurisprudence Credit Hours: (3) SLS 4205 - Legal Aspects SLM \*\* Credit Hours: (3)

#### Communication (3 hours)

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4373 - Internacial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3)

Computer Use & Technology (3 hours)

JRSM 3900 - Visual Media \*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) SLS 3005 - Computer Applctn Sport/Leisure \*\* Credit Hours: (3)

#### Internship (6 Hours)

PADM 4231 - Admin Internship Credit Hours: (3-12) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (6-12 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Organizational Leadership, (B.P.S.)

The concentration in Organizational Leadership is designed to (1) promote understanding of the nature of organizations and the fundamentals of administrative leadership; (2) allow students to reflect upon national and international organizational contexts and upon significant social and cultural

917 issues raised in those contexts; and (3) promote skills in formal and interpersonal communication, including sensitivity to personal issues having an impact upon the quality of accomplishment in the work place.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

A course taken in one group will not be counted in another group of the Professional Core.

#### Administration and Supervision (3 hours)

MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3)

#### Organizational Systems (3 hours)

MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3)

#### Statistical and Research Methods (3 hours)

EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) PADM 4101 - Political Statistics Credit Hours: (3) SOCI 3311 - Social Statistics \*\* Credit Hours: (3)

#### Written Communications (3 hours)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) PBRL 3421 - Public Relations Writing \*\* Credit Hours: (3)

#### Team and Organizational Relations (3 hours)

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4341 - Interpersonal Communication \*\* Credit Hours: (3) COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Political and International Context (3 hours)

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) ACCT 3011 - Business Law \*\* Credit Hours: (3) HIST 3212 - Latin American History since 1808 Credit Hours: (3) HIST 3274 - Islamic History since 1405 Credit Hours: (3) HIST 3291 - Modern Asia Credit Hours: (3) HIST 3302 - Modern Europe 1800-Present \*\* Credit Hours: (3) HIST 3881 - African American History \*\* Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) POLS 3302 - West Europe Govt/Politics Credit Hours: (3) POLS 3306 - Latin American Govt/Politics Credit Hours: (3) POLS 3309 - Govt/Politics of Mid East \*\* Credit Hours: (3) POLS 3509 - Contmp Prblm Intl Relation Credit Hours: (3) POLS 4307 - Govt and Pol Communist China Credit Hours: (3)

#### Organizational Leadership Concentration (15 hours)

NOTE: No more than 3 courses from any one area

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) \* COUN 4611 - Intro to Counseling Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) \* COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3) LEAD 3350 - The Adult Learner Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) \* PADM 3601 - Public Admin\*\* Credit Hours: (3) \* PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) \* PSYC 3101 - Psychology of Personality Credit Hours: (3) PSYC 3106 - Social Psychology \*\* Credit Hours: (4) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3)

### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

# General Electives (37-43)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Preschool & Child Care Administration, (B.P.S.)

These guidelines for a Bachelor of Professional Studies with a concentration in Preschool and Child Care Administration are designed for persons seeking careers in the administration of early childhood programs including childcare centers, both for-profit and non-profit; private and public pre-kindergarten programs; Head Start; pre-schools; parents' day out programs; before and after school care; and centers for children with special needs. Also served by these guidelines are persons with experience in childcare settings from a wide variety of backgrounds, including childcare volunteers and aides, as well as teachers and directors. In addition to core content in early childhood professional knowledge, there is course work to develop skills in fiscal management, recruiting and hiring personnel, health and safety management, board relations, marketing and public relations, and liaison with professional associations and regulatory agencies.

This Program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: <u>http://www.memphis.edu/tep/</u>.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (63 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Child Development and Family Studies (21 hours)

NOTE: No more than 6 hours may be substituted in this section

CDFS 2100 - Intro Fld of Chld Dev & Fam St Credit Hours: (3) CDFS 2101 - Family/Global Perspective \*\* Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3) CDFS 4223 - Home/School/Comm Engage Credit Hours: (3) CDFS 4910 - Ethics in Early Care and Learning Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3)

### Educational Context (9 hours)

AUSP 4006 - Language & Speech Development Credit Hours: (3) CDFS 3420 - Play-Based Assessment for Young Children (0-4) Credit Hours: (3) CDFS 4101 - Int Curr for Early Learners Credit Hours: (3) EDPR 4301 - Early Child Dev/Begin Teacher Credit Hours: (3) SPED 2000 - Foundation/Exceptional Learn Credit Hours: (3)

#### Families and Culture (9 hours)

SOCI 3401 - Social Inequality \*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3)

#### Group B: (3 hours)

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4411 - Urban Anthropology Credit Hours: (3) HIST 4831 - History American Family \*\* Credit Hours: (3) HIST 4863 - History/Childhood in America \*\* Credit Hours: (3) SOCI 3831 - Sociology of the Family\*\* Credit Hours: (3)

#### Group C: (3 hours)

HIST 4851 - History of Women in America \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 4460 - Black/White Women in South Credit Hours: (3)

#### Program Administration (21 hours)

#### Fiscal Management (6 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)

#### Human Resource Management (6 hours)

MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3)

#### Health and Safety Management (6 hours)

NUTR 2202 - Nutrition \*\* Credit Hours: (3) HMSE 2102 - ARC First Aid and CPR Credit Hours: (3)

#### Marketing and Public Relations (3 hours)

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3)

#### Internship (3 hours)

UNIV 4110 - Internship\*\* Credit Hours: (3-6)

#### College Requirements (9 hours)

Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

921

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (7-13 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **Professional Studies, Technology Management Services - (B.P.S)**

The concentration in Technology Management Services is designed for experienced technicians who wish to enhance their technical expertise while at the same time increasing their skills in management, organizational relations, and communication; their knowledge of contexts within which the management of technology fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (54 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Technology Concentration: 24 hours (12 hours must be upper division)

# This includes courses taken from such departments as

- Engineering
- Engineering Technology
- Manufacturing Engineering
- Architecture
- Mathematics

- Computer Science
- Biology
- Chemistry
- Physics
- Earth Sciences
- and other approved courses.

### NOTE:

It is assumed that students will take all technology concentration courses from one area. Students wishing to take a combination of classes from the above areas need permission of the College of Professional & Liberal Studies executive dean. A limited number of classes from Management Information Systems (MIS/ISDS) is allowed but cannot make up the entire content of the technology concentration. Students wishing to pursue a career in information technology or management information systems should major in these areas.

#### Management Services (30 Hours)

#### Administration and Supervision (3 Hours)

MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) PADM 3601 - Public Admin\*\* Credit Hours: (3)

#### Organizational Systems (3 Hours)

MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) PADM 4226 - Intro Nonprofit Organizations Credit Hours: (3) PSYC 3508 - Indust/Organizatnl Psyc Credit Hours: (3)

#### Marketing and Public Relations (3 Hours)

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) PBRL 3400 - Intro to Public Relations Credit Hours: (3)

#### Administrative Skills (3 Hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)

#### Statistical & Research Methods (3 Hours)

SOCI 3311 - Social Statistics \*\* Credit Hours: (3) EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) MATH 4611 - Intro Applied Statistics Credit Hours: (3)

#### Team and Organizational Relations (3 Hours)

COMM 4011 - Communication in Organizations \*\* Credit Hours: (3) COMM 4342 - Small Group Communication Credit Hours: (3) COMM 4373 - Interracial Communication\*\* Credit Hours: (3) COMM 4375 - Intercultural Communication \*\* Credit Hours: (3) COUN 4621 - Human Interactions Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3)

#### Written Communication (3 Hours)

ENGL 3601 - Technical and Profess Writing \*\* Credit Hours: (3) ENGL 3602 - Professional Editing \*\* Credit Hours: (3) ENGL 3603 - Engineering Communications Credit Hours: (3) ENGL 3604 - Persuasive Writing \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3)

#### Social & Cultural Context (3 Hours)

ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4412 - Neighborhood Development Credit Hours: (3) CJUS 4180 - Corporate/White Collar Crime \*\* Credit Hours: (3) COMM 3003 - Television and Culture\*\* Credit Hours: (3) SLS 3105 - Sport/Leisure as Pop Culture \*\* Credit Hours: (3) SOCI 3422 - Racial/Ethnc Minorities \*\* Credit Hours: (3) SOCI 3432 - Sociology of Gender \*\* Credit Hours: (3) SOCI 3831 - Sociology of the Family\*\* Credit Hours: (3) SOCI 4631 - Cities in Change Credit Hours: (3)

#### Political & Economic Context (3 Hours)

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) HIST 4824 - Business History Credit Hours: (3) POLS 4510 - Politics of Global Economy \*\* Credit Hours: (3) ESCI 4430 - Economic Geography Credit Hours: (3)

#### Technology & Culture (3 hours)

COMM 4014 - Communication on the Internet \*\* Credit Hours: (3) HIST 3035 - Technology/Culture Am History\*\* Credit Hours: (3) PHIL 3512 - Science/Technology/Human Values Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3)

#### College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior

project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

924

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

## General Electives (6-22)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Professional Studies, Urban Studies (B.P.S.)

This concentration provides a structure of study for students interested in the origin, evolution, and function of cities and metropolitan areas. Courses have been chosen to allow exploration of multiple perspectives on the dynamics of urban change, the causes of urban problems, and the sources of urban innovation. Special emphasis is given to the physical development of communities, and the interaction of that development with the social, economic, and environmental wellbeing of communities. The curriculum considers theories, ideologies, and practices to support solutions to urban and regional problems and offers students opportunities to engage in addressing local challenges with community partners. This course of study prepares students for pursuit of a professional master's degree in a related discipline (e.g., City Planning, Public Policy, Public Administration, etc).

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (45 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Urban Studies Foundations (15 hours)

ANTH 4010 - Ethnographic Methods Credit Hours: (3)

PLAN 3451 - Introduction to Planning Credit Hours: (3) (Crosslisted with ESCI 3451)

PLAN 4003 - Community Economic Development Credit Hours: (3)

PLAN 4201 - Urbanization and Environment Credit Hours: (3) (Crosslisted with ESCI 4201)

PLAN 4551 - Urban Planning Studio Credit Hours: (3) (Crosslisted with ESCI 4551)

#### Urban Studies Support (15 hours)

ANTH 4412 - Neighborhood Development Credit Hours: (3) ARCH 1211 - History of Architecture 1 Credit Hours: (3) ARCH 2212 - History of Architecture 2 Credit Hours: (3) ECON 4220 - Urban Economics Credit Hours: (3) ESCI 4443 - Transportation Planning Credit Hours: (3) ESCI 4515 - Geographic Info Science Credit Hours: (3) PLAN 4004 - Community Organizing Credit Hours: (3) PLAN 4261 - Plan Sustainable CitiesRegions Credit Hours: (3) (Crosslisted with ESCI 4261) POLS 3211 - State/Local Government Credit Hours: (3)

### Urban Studies Exploration (15 hours)

NOTE: May use any of the courses not used toward the Urban Studies Support requirement to satisfy Urban Studies Explorations

ANTH 3282 - American Communities \*\* Credit Hours: (3) ANTH 4411 - Urban Anthropology Credit Hours: (3) ARCH 1120 - Intro to Architecture + Design Credit Hours: (3) ARCH 3221 - Determinants of Modern Design Credit Hours: (3) ARCH 3222 - Contemporary Architecture 1 Credit Hours: (3) ARCH 4022 - Architecture+Urbanism Seminar Credit Hours: (3) ARCH 4023 - Urban Design Seminar Credit Hours: (3) ARCH 4231 - Issues in City Building Credit Hours: (3) ARCH 4421 - Sustainable Design Credit Hours: (3) ESCI 4431 - Urban Geography Credit Hours: (3) PLAN 4002 - Urban Food Security Credit Hours: (3) POLS 3213 - Intro to Public Policy \*\* Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4631 - Cities in Change Credit Hours: (3) SWRK 2010 - Introduction to Social Work\*\* Credit Hours: (3)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Elective (25-31 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper division hours.

# Professional Studies, Visual Merchandising and Exhibition Design (B.P.S.)

The Visual Merchandising and Exhibition Design concentration is an interdisciplinary program and comprises developing environments such as homes, stores, display windows and other merchandise displays; as well Exhibition Design, including trade shows and installations at large scale events, like pop-up stores.

### General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

926

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

### Merchandising and Design Core (15 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising Credit Hours: (3) MRCH 2010 - Textiles Credit Hours: (3) MRCH 2300 - Contemporary Design Mavens and Influencers Credit Hours: (3) MRCH 3000 - Color and Basic Design Studies and Applications Credit Hours: (3) MRCH 3215 - Textiles Applications Credit Hours: (3)

### Visual Merchandising & Exhibition Design Concentration (24 hours)

MRCH 2004 - Tech Skills for Merchandising Credit Hours: (3) MRCH 2050 - Computer Applications for VMED Credit Hours: (3) MRCH 2106 - 3D Visual Merchandising Credit Hours: (3) MRCH 3010 - Trends in Home and Exhibition Credit Hours: (3) MRCH 3220 - Materials Exploration Credit Hours: (3) MRCH 3600 - Consumer Engagement in the Digital Era Credit Hours: (3) MRCH 3700 - Strategic Design for Residential Space Credit Hours: (3) MRCH 4200 - Strategic Design for Exhibition Space Credit Hours: (3)

#### Senior Year Requirements (6 hours)

MRCH 4600 - Senior Seminar Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6)

### College Requirements (9 hours)

### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

MRCH 3050 - Costume History Credit Hours: (3) MRCH 4205 - Behavioral Sci Aspects Clothng Credit Hours: (3)

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on their concentration.

UNIV 4995 - Senior Project\*\* Credit Hours: (3) (completed during the final semester)

### General Electives (25-31 hours)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### **Alcohol and Drug Abuse Services Minor**

Alcohol and Drug Abuse Services (18 hours) This interdisciplinary minor examines societal alcohol and drug abuse from the perspectives of anthropology, counseling, criminal justice, psychology, and sociology. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

### Required Core Courses (6 hours)

COUN 4783 - Alcohol/Drug Abuse Services Credit Hours: (3) (Required)

Choose one ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) PSYC 3507 - Alcohol/Drugs/Behavior \*\* Credit Hours: (4)

### Plus 4 Additional Courses from the Following List (12 Hours)

Students may include the second class in the above list as part of the required courses for this section.

CJUS 4152 - Drug Misuse and Abuse Credit Hours: (3) COUN 4781 - Strategy/Crisis Intervention Credit Hours: (3) CRMJ 2332 - Drug Identification & Effects\*\* Credit Hours: (3) SOCI 3501 - Sociology of Deviant Behavior \*\* Credit Hours: (3) SOCI 3112 - Contemporary Social Problems \*\* Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3)

### **American Studies Minor**

The American Studies minor engages students in an examination of the culture and society of the United States, with attention paid to the ways in which Americans express their basic values and give meaning to their institutions and everyday social practices. These values, institutions, and practices are a reflection, in part, of the different experiences of a people, according to their race, gender, class, and historical roots. This minor provides an opportunity to explore the commonalities and differences among Americans through an interdisciplinary course of study.

#### Requirements

#### Required Core Courses (6 hours)

Chose two courses from this area; the other two courses may be used in the elective courses if desired.

UNIV 3522 - American Cinema \*\* Credit Hours: (3) UNIV 3526 - War & American Society \*\* Credit Hours: (3) UNIV 3531 - Am Exp: Image/Narrative \*\* Credit Hours: (3) UNIV 3542 - Baseball in America \*\* Credit Hours: (3)

#### Elective Courses (12 hours)

Select four courses from the following list; may also use the remaining two from the Required Core Courses. No more than two courses from any single department will be accepted.

ANTH 3282 - American Communities \*\* Credit Hours: (3) COMM 4851 - Film History II Credit Hours: (3) COMM 4856 - Gender and Film Credit Hours: (3) ENGL 3325 - Af/Am Lit thru Harlem Ren \*\* Credit Hours: (3) ENGL 3326 - Af/Am Lit since Harlem Ren \*\* Credit Hours: (3) ENGL 3327 - American Literature to 1865 \*\* Credit Hours: (3) ENGL 3328 - American Literature since 1865 Credit Hours: (3) HIST 3035 - Technology/Culture Am History\*\* Credit Hours: (3) HIST 3863 - American Ideas and Culture Credit Hours: (3) HIST 4851 - History of Women in America \*\* Credit Hours: (3) MUHL 4801 - American Folk/Popular Music Credit Hours: (3) MUHL 4804 - Blues Credit Hours: (3) MUHL 4805 - History of Rock and Roll Credit Hours: (3) MUHL 4806 - History of Jazz Credit Hours: (3) MUHL 4807 - Memphis Music Credit Hours: (3) SOCI 3420 - Sociology of the South Credit Hours: (3) SOCI 4420 - Racial Inequality Credit Hours: (3)

# **Child Development Minor**

This interdisciplinary minor will attract students with majors in education, human services, nonprofit administration, psychology, social work, and related areas.

NOTE: Students who are pursuing concentrations in Child Development & Family Studies, Child Life Specialist, Early Care & Learning, Early Intervention Specialist, and Preschool & Childcare Administration are not eligible to pursue this minor as the courses are included in these concentrations.

### Requirements

#### Required Courses (9 hours)

CDFS 3401 - Parent Child Relations Credit Hours: (3) EDPR 2111 - Development Across Lifespan Credit Hours: (3) PSYC 3103 - Child Psychology \*\* Credit Hours: (3)

#### Plus 9 Additional Upper Division Hours From:

ANTH 3511 - Culture/Kin/Family Credit Hours: (3)
CDFS 3410 - Soc Emotion Lrng Early Child Credit Hours: (3)
CDFS 4220 - Understand Chldn/Behv/Guide Credit Hours: (3)
HIST 4863 - History/Childhood in America \*\* Credit Hours: (3)
Choose one PSYC course option below:
PSYC 3305 - Psyc Learning/Memory\*\* Credit Hours: (3)
PSYC 4034 - Children Soc Relationships Credit Hours: (3)
PSYC 4102 - Abnormal Child Psych Credit Hours: (3)
SWRK 4934 - Child Welfare Policy/Services Credit Hours: (3)

# **Community Action and Social Change Minor**

The Community Action and Social Change Minor will bridge theory and action in order to provide the structure for students that desire to be change makers in their local and global communities. The minor is designed with a community focus to bring about a more sustainable, equitable, and just world; the minor aims to address social and environmental issues, develop community-engaged knowledge and skills, and better prepare students for modern challenges and careers that contribute to the public good. The minor is designed to guide students to cultivate civic responsibility, take part in collective action, and gain valuable mentorship from community experts. Intended to complement many of our majors, the Community Action and Social Change minor provides students across academic disciplines a sustainable and developmental path towards deeper and more meaningful engagement in the community.

### Required Courses: 18 hours

UNIV 2200 - Introduction to Student Development Credit Hours: (3) UNIV 3303 - Phil/Theory of Leadership Credit Hours: (3) UNIV 3304 - Leadership & Social Change Credit Hours: (3) UNIV 3305 - Strengths Based Leadership Credit Hours: (3) UNIV 4110 - Internship\*\* Credit Hours: (3-6) UNIV 4995 - Senior Project\*\* Credit Hours: (3)

# **Legal Studies Minor**

The Legal Studies minor is designed for students whose personal interests or professional aspirations call for a more concrete understanding of how the American legal system works in modern practice. This minor goes beyond looking at law from a theoretical, sociological, or philosophical perspective and instead exposes students to the operational nuts-and-bolts of today's major civil and criminal practice areas, including tort law, business law, and legal research and analysis. The minor is open to students majoring in any area of study in any undergraduate college or school **except** students pursuing a BPS in Legal Studies.

### **Required Courses**

LEGL 2400 - Legal Ethics Credit Hours: (3) LEGL 2410 - Intro to Law Credit Hours: (3) LEGL 3150 - Legal Research/Writing | Credit Hours: (3) LEGL 3420 - Torts Credit Hours: (3)

#### Choose one from the following:

LEGL 3410 - Contracts Commercial Law Credit Hours: (3) or LEGL 3430 - Business Associations Credit Hours: (3) or LEGL 3487 - Admin Law/Procedure Credit Hours: (3)

### Choose one from the following:

LEGL 3440 - Civil Procedure Credit Hours: (3) or LEGL 3486 - Criminal Law & Procedure Credit Hours: (3) or LEGL 4200 - Healthcare Liability Credit Hours: (3) or LEGL 4300 - Immigration Law Credit Hours: (3)

# **Religion in Society Minor**

This minor examines the role of religion in society throughout history. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

### Requirements

```
Required Courses (6 Hours)
```

RLGN 1100 - Introduction to Religion \*\* Credit Hours: (3) RLGN 3100 - Perspectives on Religion Credit Hours: (3)

### Additional Courses (12 Hours)

ANTH 4253 - Anthropology of Religion ENGL 4461 - Bible as Literature **Credit Hours:** (3) HIST 3275 - History of Jewish People **Credit Hours:** (3) JDST 2850 - Religions of Abraham **Credit Hours:** (3) JDST 3661 - Perspectives on the Old Testament **Credit Hours:** (3) JDST 4511 - Holocaust Studies **Credit Hours:** (3) PHIL 3701 - Human and the Divine **Credit Hours:** (3) UNIV 3565 - Comparative Christianity\*\* **Credit Hours:** (3) UNIV 3590 - New Testament **Credit Hours:** (3)

# Liberal Studies, (Accelerated B.L.S./M.A.L.S.)

The Accelerated Bachelor of Liberal Studies to Master of Arts in Liberal Studies (MALS) program provides an opportunity for high quality, academically engaged students to complete a Bachelor's and Master's degrees in five years as opposed to the traditional trajectory of six years. The proposed program does not alter the requirements for either degree, but allows students to count up to 12 credit hours of graduate level courses toward both degrees, thereby reducing the total time to complete the MALS degree. The three required graduate courses are listed below, taken in the senior year:

UNIV 7000 Foundations of Liberal Studies (3 hours): Analytical introduction to graduate liberal studies and its theoretical framework; readings concerning the humanities, social sciences, and natural sciences.

UNIV 7100 Research in Interdisciplinary Studies (3 hours): Methods of inquiry and research appropriate to graduate interdisciplinary studies. UNIV 7200 Liberal Studies Seminar (3 hours): Interdisciplinary examination of a major issue, historical period, or theme. Topic may vary.

# **B.P.S.** in Legal Studies/Juris Doctor (B.P.S./J.D.)

This is a "3+3" program that allows eligible UM students to earn a bachelor's degree and a law degree in six years, saving a full year of time and tuition. Students would start in the undergraduate Legal Studies Program, which emphasizes four correlated disciplines: (1) theory, process, application, and ethics of law; (2) research and investigation; (3) law-related technologies, and (4) professional decorum and communication skills. The standard Legal Studies degree requirements are compressed into three years and adjusted to ensure that students take specific courses to best prepare them for law school. Those with qualifying GPAs and LSAT scores may then apply to the Cecil C. Humphreys School of Law early in their junior year. If accepted, students would enroll in first-year law school coursework during their senior year. Credits earned as a first-year law student would count towards the final 30 hours of undergraduate coursework. Students would graduate with a Bachelor of Professional Studies (BPS) degree in Legal Studies and then continue with their final two years of law school.

**Please Note:** Enrolling in the BPS/JD Program as an undergraduate does not guarantee admission to the law school. Students who are not accepted to the law school or who do not successfully complete all their law school courses may still finish their undergraduate degree in the Legal Studies Program.

# General Education (35-41 hours)

See University General Education Program for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

# Coordinated Study (54 hours; 24 at Law School)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

No more than 15 hours of the Legal Studies Professional Core may be satisfied through transfer credit.

#### Legal Studies Core

LEGL 2400 - Legal Ethics Credit Hours: (3) LEGL 2410 - Intro to Law Credit Hours: (3) LEGL 3150 - Legal Research/Writing I Credit Hours: (3) LAW 111 - Contracts LEGL 3420 - Torts Credit Hours: (3) LEGL 3440 - Civil Procedure Credit Hours: (3) LEGL 3484 - Bankruptcy Practices Credit Hours: (3) LAW 126 - Criminal Law LAW 113 - Legal Methods UNIV 4110 - Internship\*\* Credit Hours: (3-6) -Legal

### Law-Related Electives (12 hours)

LAW 115 - Property I

LAW 125 - Property II

LAW 112 - Torts I

LAW 122 - Torts II

#### Interdisciplinary Electives (12 hours\*)

LAW 114 - Civil Procedure I

\*Three of the 12 interdisciplinary elective hours will be satisfied by first-year law school courses.

### College of Professional & Liberal Studies Requirements (9 hours; 6 at Law School)

#### **Thematic Studies**

Thematic Studies Course (3)

LAW 121 - Contracts II (2)

LAW 124 - Civil Procedure II (2)

LAW 123 Legal Methods II (2)

### General Electives (16-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# **College of Professional & Liberal Studies**

#### Major

#### Alcohol and Drug Abuse Services, (B.P.S.)

Students in the Alcohol and Drug Abuse Services concentration will select courses in alcohol & drug abuse and social & public services. Prior work experience is welcomed and evaluated through portfolio assessment. Internships are also included in this concentration. Persons pursuing this degree typically provide services to those disabled by alcohol and drug abuse, including abusers, families, friends, colleagues, and associates. Wishing to build upon knowledge of and experience in alcohol and drug abuse treatment, persons served by these guidelines will seek careers in Alcohol & Drug

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Abuse (A&D) Services as providers of social and public services in hospitals, social service agencies, employee assistance programs, churches, etc. Some may wish to continue their education in graduate-level programs.

932

#### **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

#### **Coordinated Study (30 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# **Professional Core (6 hours)**

#### Choose two courses:

SWRK 2911 - Soc Response to Human Need COUN 4611 - Intro to Counseling COUN 4621 - Human Interactions

# Alcohol and Drug Core (6 hours)

#### Choose two courses:

ANTH 4531 - Alcohol/Drugs/Culture CJUS 4152 - Drug Misuse and Abuse COUN 4783 - Alcohol/Drug Abuse Services PSYC 3507 - Alcohol/Drugs/Behavior Prerequisites: PSYC 1030, PSYC 3010, PSYC 3020.

# **Professional Writing (3 hours)**

#### Choose one course:

ENGL 3601 - Technical and Profess Writing ENGL 3604 - Persuasive Writing MGMT 3510 - Business Communications (Prerequisite - MIS 2749)

#### Social and Public Services (15 hours)

#### Choose five courses:

CJUS 4533 - Juvenile Delinq Theory/Process COUN 4781 - Strategy/Crisis InterventionPOLS 3213 - Intro to Public Policy PSYC 3102 - Abnormal Psychology PSYC 3103 - Child Psychology PSYC 3106 - Social Psychology SOCI 3501 - Sociology of Deviant Behavior SOCI 4851 - Medical Sociology

# **Guided Electives and Internship (15 hours)**

Guided Electives - Choose any 12 hours from courses in the Coordinated Study that have not already been taken.

Internship

UNIV 4110

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses:

https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester)

# **Electives**

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

#### Asian Studies and International Trade, (B.L.S.)

#### See College of Professional & Liberal Studies website for additional information

#### **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

#### Coordinated Study (39-51 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Foreign Language (9-21 hours)

Requirement: 9 hours at the 3000-level or above.

934 Students with previous background in the chosen language (Chinese or Japanese) must take the placement test to determine in what course they should enroll.

Students with no previous background in the chosen language will enroll in CHIN 1010 or JAPN 1010.

#### Area Studies (6 hours)

Students must complete 6 hours from the following:

HIST 3290 - Traditional East Asia HIST 3291 - Modern Asia HIST 4292 - Modern China 1800-Present HIST 4294 - Modern Japan 1800-Present International Economics and Business Studies (24 hours)

ECON 2010 - Intro to Macroeconomics (Required)
ECON 2020 - Intro to Microeconomics (Required)
FIR 3410 - Financial Management
FIR 4550 - International Finance
MGMT 3110 - Organization and Mgmt
MGMT 4810 - International Management
MKTG 3010 - Principles of Marketing
MKTG 4530 - International Marketing

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses at: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **Recommended choices:**

ESCI 4307 - Thematic Studies/China UNIV 4506 - The Chinese UNIV 3550 - Clash of Cultures Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

#### • UNIV 4995 - Senior Project (Completed during the final semester)

#### **Recommended Electives (hours vary)**

ANTH 3200/ESCI 3200 - Peoples/Cultures World ANTH 3511 - Culture/Kin/Family ANTH 4413 - Anth of Tourism/Environment COMM 4373 - Interracial Communication COFS 2101 - Family/Global Perspective ESCI 1301 - Survey of World Regions ESCI 1401 - Intro/Cultural Geography INTL 4601 - Seminar International Studies JOUR 4712 - Media and Cultures PADM 4401 - Comparative Public Adm POLS 1301 - Intro to Comparative Politics POLS 1501 - International Relations POLS 3310 - Politics/Developed World POLS 3320 - Human Rights/World Politics
POLS 3325 - Politics/Developing World
POLS 3330 - Politics/Globalization
POLS 3505 - International Organizations
POLS 3506 - American Foreign Policy
POLS 3509 - Contmp Prblm Intl Relation
POLS 4307 - Govt and Pol Communist China
POLS 4504 - International Law
POLS 4506 - Prob American Foreign Policy
POLS 4508 - Theories Internatl Relations
POLS 4510 - Politics of Global Economy
POLS 4511 - International Security
SOCI 2100 - Sociology of Globalization
SOCI 4413 - Global Info Tech & Soc of Work

#### Baccalaureate Contract Program (Design Your Own Degree)

Undergraduate students admitted to College of Professional & Liberal Studies may design either of two degrees through the Baccalaureate Contract Program: the Bachelor of Liberal Studies (B.L.S.) or the Bachelor of Professional Studies (B.P.S.). To be eligible for this program, a student must have a cumulative undergraduate grade point average of 2.50. Upper-division courses within the student's Coordinated Study (i.e., major) must be from two or more departments on campus. In addition, the proposed degree must be unlike any other degree offered by the University of Memphis. All baccalaureate contracts will be reviewed and approved by a baccalaurate contract advisor and by the assistant director of student services in the College of Professional & Liberal Studies. The baccalaureate contract must include work to be completed in the following areas: (1) General Education, (2) Coordinated Study, (3) Thematic Studies, (4) a Senior Project, and (5) General Electives.

Additional information may be found on the College of Professional & Liberal Studies website.

#### Child Development and Family Studies, (B.P.S.)

The Bachelor of Professional Studies in Child Development and Family Studies focuses on recognizing and enhancing important developmental milestones for children from birth through adolescence. Students will learn how to create effective learning environments to promote children's healthy development as well as assist parents in creating positive relationships and environments for the development of their children. In addition, students study the stages of development from infancy through adolescence and the ways that family, culture, peers, and schools influence the growth of children. Students will also explore the importance of advocacy for children and their families whether it be in the classroom, hospital, or justice system.

The B.P.S. in Child Development and Family Studies courses are designed to reflect professional standards set forth by the National Association for the Education of Young Children (NAEYC). These standards are critical indicators of program quality.

In addition to core courses based on early childhood development, these guidelines contain course work designed to develop skills and knowledge of the historical, social, cultural, and educational contexts of the field.

# This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728.

#### **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: Undergraduate Catalog

#### **Coordinated Study (48 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Child Development & Family Studies Core (18 hours)

EDPR 2111 - Development Across Lifespan CDFS 2100 - Intro Fld of Chld Dev& Fam St CDFS 2101 - Family/Global Perspective CDFS 3401 - Parent Child Relations CDFS 4220 - Understand Chldn/Behv/Guide CDFS 4223 - Home/School/Comm Engage

#### Family and Society (6 hours)

ANTH 3511 - Culture/Kin/Family PSYC 4034 - Children Soc Relationships SOCI 3422 - Racial/Ethnc Minorities SOCI 3432 - Sociology of Gender SOCI 4442 - Sociology of Poverty MRCH 4300 - Family Resource Management

#### Counseling (3 hours)

COMM 4341 - Interpersonal Communication COUN 4611 - Intro to Counseling COUN 4621 - Human Interactions COUN 4781 - Strategy/Crisis Intervention COUN 4783 - Alcohol/Drug Abuse Services

#### Historical Context (3 hours)

ANTH 3282 - American Communities HIST 3881 - African American History HIST 4831 - History American Family HIST 4851 - History of Women in America HIST 4853 - African American Women HIST 4863 - History/Childhood in America Social Services and Public Policy (6 hours)

#### •

PADM 3601 - Public Admin

• PADM 4226 - Intro Nonprofit Organizations

• POLS 3213 - Intro to Public Policy

All SWRK courses require permit from the department.

• SWRK 2911 - Soc Response to Human Need

• SWRK 3902 - Human Behavior/Soc Envrnmnt

• SWRK 4934 - Child Welfare Policy/Services

#### **Educational Context (9 hours)**

\*College of Professional & Liberal Studies students MUST be Junior standing in order to enroll in ECED courses\*

ART 3411 - Art for Children CDFS 4101 - Int Curr for Early Learners ECED 3555 - Obsrv/Assmnt Infant/Erly Ch \* HLSC 3306 - Elementary School Health and Wellness ENGL 3401 - Children's Literature SPED 2000 - Foundation/Exceptional Learn

#### Internship (3 hours)

UNIV 4110 – Internship College Requirements (9 hours)

**Thematic Studies (6 hours)** 

936

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

937

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester) General Electives (22-28 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Child Life Specialist (B.P.S.)

These guidelines are designed for persons seeking careers as child life specialists. Child life specialists are professionals who work closely with children and their families in hospitals and other settings to help them cope with the challenges of hospitalization, illness, and disability. Child life specialists provide children with age-appropriate preparation for medical procedures, pain management and coping strategies through a variety of different activities. Students must complete the application process as the field is highly selective.

# This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/

# University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (56 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Child Development & Family Studies Core (18 hours)

- EDPR 2111 Development Across Lifespan CDFS 2100 - Intro Fld of Chld Dev& Fam St CDFS 2101 - Family/Global Perspective CDFS 3401 - Parent Child Relations
- CDFS 4220 Understand Chldn/Behv/Guide
- CDFS 4223 Home/School/Comm Engage

# Child Life Specialist Concentration (22 hours)

CDFS 4240 - Hospitalized Children and Their Families CDFS 4260 - Child Life: Theory and Practice CDFS 4300 - Play/Therapeutic Interventions PSYC 4513 - Psychology of Grief/Loss HIST 4863 - History/Childhood in America CLAS 3021 - Medical Terminology Choose one of the following:

SOCI 3311 - Social Statistics

# Group A: Family Dynamics (3 hours)

ANTH 3511 - Culture/Kin/Family SOCI 3831 - Marriage and Family UNIV 3535 - Family Communication Group B: Diverse Interactions (3 hours)

SPED 2000 - Foundation/Exceptional Learn SOCI 3422 - Racial/Ethnc Minorities COUN 4621 - Human Interactions Group C: Early Childhood (3 hours)

ECED 3555 - Obsrv/Assmnt Infant/Erly Ch ECED 4540 - Pln/Fclt Infant/Toddler Dev EDPR 4301 - Early Child Dev/Begin Teacher Group D: Educational Context (3 hours)

ENGL 3401 - Children's Literature ART 3411 - Art for Children CDFS 4101 - Int Curr for Early Learners **Group E: Field Experience (4 hours)** 

UNIV 4110 - Internship College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: http://www.memphis.edu/univcoll/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester) General Electives (25-31 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

### Disability Studies and Rehabilitation Services, (B.P.S.)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Disability Studies and Rehabilitation Services are designed for students seeking to be academically and professionally grounded in issues faced by individuals seeking disability services. Students will also be exposed to the theme of employment – including vocational adjustment and appropriate job placement – and independent living outcomes as reaffirmed in the Rehabilitation Act Amendments of 1992. Rehabilitation depends heavily upon communication between both the consumer and professional and among various professionals; consequently, communication will be stressed, as well as an understanding of the potential influence of cultural diversity and individual lifestyle choices. Courses will also enable students to understand the methods used in disability services to solve consumer problems and utilize available resources. Finally, a well-supervised field experience component will provide students the opportunity to integrate classroom principles and develop entry-level skills in a work setting.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

939

# **Coordinated Study (58 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# **Professional Core (19 hours)**

COUN 4901 - Princ/Tech/Rehab Counseling COUN 4913 - Medical/Psyc Aspects/Rehab COUN 4921 - Vocational Dev/Occupation Info SWRK 3902 - Human Behavior/Soc Envrnmnt SWRK 3903 - Social Work Practice I **Choose one of the following:** 

SWRK 2010 - Introduction to Social Work SWRK 2911 - Soc Response to Human Need Statistics and Research Methods (3 hours; pick 1) PSYC 3010 - Research and Statistics I SOCI 3311 - Social Statistics SOCI 3322 - Methods of Social Research **Rehabilitation Delivery (12 hours)** 

COUN 4611 - Intro to Counseling COUN 4781 - Strategy/Crisis Intervention COUN 4783 - Alcohol/Drug Abuse Services PADM 4207 - Health Politics/Policy PETE 3308 - Exceptional Learner Phys Ed PSYC 3512 - Health Psychology SLS 3905 - Leisure/Recr Disabilities

**Management Services (9 hours)** 

ACCT 2010 - Fundamentals of Acct I MGMT 3110 - Organization and Mgmt MGMT 3215 - Management of Human Resources PADM 3601 - Public Admin PADM 4226 - Intro Nonprofit Organizations PADM 4227 - Issues/Nonprofit Admin **Communications (6 hours)** 

# Communications (0 nours)

# Group A: Professional Communications (3 hours)

MGMT 3510 - Business Communications ENGL 3601 - Technical and Profess Writing ENGL 3604 - Persuasive Writing COMM 4011 - Communication in Organizations **Group B: Interpersonal Communications (3 hours)** 

COMM 4373 - Interracial Communication COMM 4375 - Intercultural Communication COUN 4621 - Human Interactions **Development and Aging (6 hours)**  EDPR 2111 - Development Across Lifespan HMSE 4305 - Problems/Health Sport Science LEAD 3350 - The Adult Learner SOCI 3112 - Contemporary Social Problems SOCI 4541 - Sociology of Aging SOCI 4851 - Medical Sociology SOCI 4852 - Sociology of Mental Illness UNIV 4527 - The Developing Adult

# Internship (3 hours)

UNIV 4110 - Internship College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester) General Electives (12-18 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Early Care and Learning, (B.P.S)

The Early Care and Learning (ECL) emphasis provides a foundation for a career in working with young children (0-4) in early care and education and other applied settings.

Students who choose the ECL emphasis are expected to develop knowledge and skills in child development and learning, observation and assessment, pedagogy and research through classroom and field experiences. Students will be prepared for employment in a discipline working with children and families, and may pursue graduate training that leads to careers in education, academia, research, health professions, or social work.

For information on careers in this and other disciplines students should consult the Career Services Office located on the 4th Wilder Tower, 678-2239.

# This Program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (51 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

941

# Child Development & Family Studies Core (18 hours)

EDPR 2111 - Development Across Lifespan CDFS 2100 - Intro Fld of Chld Dev& Fam St CDFS 2101 - Family/Global Perspective CDFS 3401 - Parent Child Relations CDFS 4220 - Understand Chldn/Behv/Guide CDFS 4223 - Home/School/Comm Engage Early Care and Learning Core (30 hours)

CDFS 3410 - Soc Emotion Lrng Early Child CDFS 4101 - Int Curr for Early Learners CDFS 4230 - Math/Science Early Learning ICL 4001 - Teaching/Diverse Environment SPED 2000 - Foundation/Exceptional Learn ECED 3555 - Obsrv/Assmnt Infant/Erly Ch ECED 4500 - Emergent Literacy/Lang Dev\* ECED 4540 - Pln/Fclt Infant/Toddler Dev\* ECED 4515 - Teach/Lrng Erly Chld Ed\* UNIV 4110 – Internship

\*College of Professional & Liberal Studies students MUST be at Junior standing (60 credits) in order to enroll in these College of Education courses.

# Working with Families Core (3 hours)

CDFS 4910 - Ethics in Early Care and Learning College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. **Students will be assigned to a specific section based on his or her concentration.** 

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (19-25 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

#### Early Intervention Specialist, (B.P.S.)

The Bachelor of Professional Studies in Early Intervention (ages 0-2) focuses on recognizing the uniqueness of the provision of instruction and/or service coordination in the field of Part C the Federal IDEA legislation for early intervention (ages 0-2). Students will learn how to promote caregiver-child interaction by assisting families to adapt routines and activities to support children's (ages 0-2) learning and interaction. In addition, students will be introduced to adult learning approaches to support caregivers and understand how cultural diversity affects family interactions and practices.

942 This program is designed to reflect professional standards set forth by the Council for Exceptional Children Division of Early Childhood. These standards are critical indicators of program quality and include:

# · Federal IDEA Part C Requirements;

- · Typical and atypical patterns of infant and toddler development and learning in all areas;
- · Functional assessment of development across domains;
- $\cdot$  Developmental disabilities in the birth-to-three population; and
- · Specialized instructional strategies to help young children (ages 0-2) learn.

This program prepares students to take the Tennessee Early Intervention Credential exams required to provide Developmental Therapy in the State of Tennessee.

# This program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/

# University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: https://catalog.memphis.edu/index.php

# **Coordinated Study (55 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

# Child Development & Family Studies Core (18 hours)

EDPR 2111 - Development Across Lifespan CDFS 2100 - Intro Fld of Chld Dev& Fam St CDFS 2101 - Family/Global Perspective CDFS 3401 - Parent Child Relations CDFS 4220 - Understand Chldn/Behv/Guide CDFS 4223 - Home/School/Comm Engage Early Intervention Specialist (12 hours)

SPED 2000 - Foundation/Exceptional Learn
SPED 4111 - Intro/Appl Behav Analysis
SWRK 2010 - Introduction to Social Work
SWRK 2911 - Soc Response to Human Need

# Early Intervention Specialist Core Supportive Competencies (12 hours)

ECED 4540 - Pln/Fclt Infant/Toddler Dev ECED 3555 - Obsrv/Assmnt Infant/Erly Ch SWRK 3902 - Human Behavior/Soc Envrnmnt (requires dept. permit, SWRK 2010 or SWRK 2911 and BIOL 1010/BIOL 1011) UNIV 3535 - Family Communication

# Guided Electives & Field Experience (13 hours)

# Group A: Family Dynamics (3 hours)

ANTH 3511 - Culture/Kin/Family LEAD 3350 - The Adult Learner SOCI 3831 - Marriage and Family SWRK 3903 - Social Work Practice I SWRK 3904 - Social Work Practice II Group B: Diverse Interactions (3 hours)

SOCI 3422 - Racial/Ethnc Minorities COUN 4621 - Human Interactions SOCI 4442 - Sociology of Poverty Group C: Educational Context (3 hours)

CDFS 4101 - Int Curr for Early Learners ENGL 3401 - Children's Literature SPED 3410 - Disorders of Language SWRK 4937 - School Social Work **Group D: Field Experience (4 hours)** 

UNIV 4110 - Internship College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: http://www.memphis.edu/univcoll/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (completed during the final semester) General Electives (19-25 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

#### **Emergency Management**, (B.P.S.)

The interdisciplinary Emergency Management concentration is designed for students with a diversity of backgrounds and interest in applying that background to emergency management, community resilience to disaster, environmental hazards mitigation, emergency management response, and business continuity/disaster recovery. It will address the following critical knowledge elements: a) the physical and social dimensions of disasters through combining knowledge from various physical, social, and applied disciplines, b) the intersection of public policy to disaster risk, response, and mitigation, c) the intersection of the private, nonprofit, and governmental sectors and how this effects emergency preparedness, mitigation, and recovery, d) sustainable development, planning for and response to extreme events and change in our physical and human landscapes; and e) communication dynamics and persuasive communication in emergencies.

#### **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

### Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

#### **Professional Core (12 hours)**

•EMGT 3100 Seminar on Emergency Management

# Choose one of the following:

EMGT 4000 - Internship\* CJUS 4100 - Ind Dir Studies ESCI 4621 - Investigations In GEOG Choose two of the following:

PADM 3601 - Public Admin CJUS 4126 - CJUS Admin and Mgmt PADM 3611 - Disaster Planning/Control PADM 3615 - Community Risk Reduction ESCI 4261 - Plan Sustainable Cities/Region MGMT 3110 - Organization and Mgmt MGMT 4710 - Strategic Management **\*NOTE: Junior level status required** Hazard/Risk Management (9 hours)

ESCI 4251 - Environmental Hazards CJUS 4190 - Terrorism Soc/Legl Prsp ESCI 3131 - Severe Weather COMM 4211 - Public Health Campaigns ARCH 4451 - Site/Environmental Planning

# Human Systems (9 hours)

ANTH 4510 - Health/Culture/Environ Justice ANTH 4511 - Medical Anthropology COMM 3322 - Theories of Persuasion COMM 4410 - Conflict Resolution and Negotiations\* Or COMM 4380 - Communication and Conflict\* SOCI 3401 - Social Inequality SOCI 3701 - Individual and Society PADM 4221 - Issues/Urban Admin PADM 4207 - Health Politics/Policy

\*NOTE: Courses are equivalent

# Analysis (3 hours)

CJUS 3129 - Statistical Methods/CJUS (4) ESCI 4521 - Quantitative Methods ESCI 4525 - Adv Geographic Info Science PADM 4101 - Political Statistics POLS 4101 - Political Statistics SOCI 3311 - Social Statistics **College Requirements (9 hours)** 

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# **General Electives (37-43 hours)**

# Fashion Design, (B.P.S)

The Fashion Design program prepares students for careers in Fashion Design for the Apparel Industry. The curriculum fosters creative expression in all aspects of Fashion Design, including fashion sketching, creative design, computer applications, draping, and pattern drafting. With this, students learn to balance hand-making and digital skills with an integrated approach to design. The program is structured to challenge and inspire students by incorporating artistic, technical, and theoretical elements into a realistic approach to the Fashion Design Industry.

# University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (36 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

# Visual Merchandising and Design Core (12 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising MRCH 2010 - Textiles MRCH 3215 - Textiles Applications MRCH 3000 - Color and Basic Design Studies and Applications Fashion Design Concentration (24 hours)

MRCH 2005 - Introd to the Fashion Industry MRCH 2000 - Fashion Sketching and Illustration for Design MRCH 3075 - Basic Industry Sewing and Construction MRCH 3100 - Pattern Drafting I MRCH 3300 - Draping Techniques MRCH 3400 - Computer Aided Fashion Drawing and Design MRCH 3450 - Computer Patternmaking MRCH 4400 - Advanced Sewing Techniques MRCH 4400 - Pattern Drafting II MRCH 4500 - Advanced Computer Patternmaking MRCH 4550 - Design and Fit Analysis MRCH 4575 - Sourcing and Technical Design

# **Guided Electives (18 hours)**

Choose any remaining courses not taken from Fashion Design Concentration or appropriate upper division courses from Art, Theater, etc. Courses from other departments should be discussed with your advisor/program coordinator before registering to determine appropriateness.

# Senior Year Requirements (6 hours)

# MRCH 4600 - Senior Seminar

The senior collection is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior collection is intended to fuse all the academic areas that comprise the student's understanding of developing a fashion collection into a relevant example of scholarship to be showcased down the runway. Students will complete a collection of their choice with approval of their senior collection instructor. The senior collection is completed during a student's final semester.

UNIV 4110 - Internship College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses at: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# **REQUIRED FOR CONCENTRATION:**

MRCH 4205 - Behavioral Sci Aspects of Clothng MRCH 3050 - Costume History Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (10-16 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Fashion Merchandising (B.P.S.)

Industry overview, financial planning and purchasing, visual presentation, color selection and coordination, textile identification, clothing characteristics, entrepreneurship and personal and professional development are all program components in this concentration.

# University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (36 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

# Visual Merchandising and Design Core (12 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising
MRCH 2010 - Textiles
MRCH 3215 - Textiles Applications
MRCH 3000 - Color and Basic Design Studies and Applications
Fashion Merchandising Concentration (24 hours)

MRCH 2004 - Tech Skills for Merchandising MRCH 2005 - Introd to the Fashion Industry MRCH 2106 - 3D Visual Merchandising MRCH 3206 - Merchandising Systems and Applications MRCH 3600 - Consumer Engagement in the Digital Era MRCH 3650 - Merchandise Buying MRCH 4560 - Trend Analysis and Styling Concepts

# MRCH 4575 - Sourcing and Technical Design **Required Minor (18 hours)**

MKTG 3010 - Principles of Marketing MKTG 3140 - Advertising and Sale Promotion Additional 12 hours in Marketing for the Marketing Management Minor. Senior Year Requirements (6 hours)

# MRCH 4600 - Senior Seminar

The senior collection is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior collection is intended to fuse all the academic areas that comprise the student's understanding of developing a fashion collection into a relevant example of scholarship to be showcased down the runway. Students will complete a collection of their choice with approval of their senior collection instructor. The senior collection is completed during a student's final semester.

# UNIV 4110 - Internship Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# **REQUIRED FOR CONCENTRATION:**

MRCH 4205 - Behavioral Sci Aspects of Clothng MRCH 3050 - Costume History Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (10-16 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Health Services (B.P.S.)

Students following guidelines for Health Services are interested in the helping professions. This curriculum will prepare students for a wide range of health care positions in hospitals, health departments, health agencies, research facilities, schools and industry. This program is also for experienced health care professionals who have completed non-baccalaureate programs in health care specialties such as medical laboratory technology, respiratory therapy, radiological technology, and nursing who will build upon their training and experience by taking courses in such areas

# University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (48 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

#### **Professional Core (27 hours)**

# **Group A: Professional Core**

ACCT 2010 - Fundamentals of Acct I Choose one of the following:

MGMT 3110 - Organization and Mgmt HCL 3000 - Healthcare Leadership HETH 4211 - Comm Healtcare Lead/Mgmt Group B: Human Resources Management (3 hours)

MGMT 3215 - Management of Human Resources HCL 4030 - Healthcare Human Resources Group C: Financial (3 hours)

ACCT 2020 - Fundamentals of Acct II ACCT 3011 – Business Law ACCT 3130 - Legal/Social/Political Environment FIR 1220 – Personal Financial Management FIR 3410 - Financial Management MRCH 4300 - Family Resource Management HCL 3010 - Healthcare Financial Mgmt

# Group D: Professional Writing (3 hours)

ENGL 3601 - Technical and Profess Writing PBRL 3421 - Public Relations Writing MGMT 3510 - Business Communications HCL 3050 - Prof Writing Healthcare

# Group E: Research Methods (3 hours)

SOCI 3311 - Social Statistics HCL 4010 - Healthcare Stats/Research HETH 4210 - Healthcare Research Methods Group F: Health Communication (3 hours)

#### Group F: Health Communication (3 nours)

COMM 3012 - Health Communication HCL 3020 - Healthcare Informatics COMM 4211 - Public Health Campaigns Group G: Policy and Social Context (3 hours)

HCL 4000 - Health Policy Issues HETH 4212 - Trends/Issues in Healthcare HLSC 4530 - Epidemiology HCL 4020 - Law/Ethics of Healthcare PADM 4226 - Intro Nonprofit Organizations

# Health Care Systems (3 hours)

HCL 3040 - U S Health System HETH 4213 - Community Health/Iss/Serv HLSC 2200 - Introduction to Public Health & Health Sciences Health Care Specialty Guided Elective (21 hours)

# NOTE: Must have 12 hours of Upper Division courses from this section.

CDFS 2101 - Family/Global Perspective COBH 4707 - International Health/Prob/Iss HCL 3020 - Healthcare Informatics HCL 3040 - U S Health System HCL 4020 - Law/Ethics of Healthcare HCL 4040 - Business Principles/Healthcare HMSE 2102 - ARC First Aid and CPR HLSC 2100 - Wellness Concepts Practice HLSC 2200 - Introduction to Public Health/Health Studies PHIL 3514 - Biomedical Ethics NUTR 2202 - Nutrition PSYC 3507 - Alcohol/Drugs/Behavior PSYC 3512 - Health Psychology SOCI 4442 - Sociology of Poverty SOCI 4451 - Medical Sociology SW 3170 - Family Caregiving UNIV 4110 - Internship

#### **College Requirements (9 hours)**

# Thematic Studies (6 hours; pick 2)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (**Completed during the final semester**) General Electives (22-28 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Human Services, (B.P.S.)

Students in Human Services are expected to develop a philosophical orientation to the human condition; to enlarge their understanding of social structures, values and norms; to study human growth and development; and to become informed about social change and social and bureaucratic organizations. Students in Human Services will take courses from such departments as Counseling and Personnel Services, Sociology and Social Work, Psychology, Management, and Special Education.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

#### **Coordinated Study (45 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

# **Basic Core (12 hours)**

COUN 4611 - Intro to Counseling COUN 4621 - Human Interactions SWRK 2010 - Introduction to Social Work SWRK 2911 - Soc Response to Human Need **Professional Writing (3 hours)**  ENGL 3604 - Persuasive Writing

ENGL 3601 - Technical and Professional Writing

MGMT 3510 - Business Communications\* (Prerequisite: MIS 2749 or equivalent course)

# **Rehabilitation/Social Intervention (6 hours)**

CJUS 4152 - Drug Misuse and Abuse COBH 4707 - International Health/Prob/Iss COUN 4781 - Strategy/Crisis Intervention COUN 4783 - Alcohol/Drug Abuse Services COUN 4901 - Princ/Tech/Rehab Counseling COUN 4913 - Medical/Psyc Aspects/Rehab COUN 4921 - Vocational Dev/Occupation Info HETH 4212 - Trends/Issues in Healthcare HETH 4213 - Community Health/Iss/Serv SLS 3905 - Leisure/Recr Disabilities SOCI 4852 - Sociology of Mental Illness SW 3170 - Family Caregiving SWRK 3920 - Soc Welfare Policy/Programs\* (Prerequisite: SWRK 2010, 2911) UNIV 3534 - Theatre & Therapy

# Support Courses (21 hours)

# NOTE: Take no more than six hours in any one discipline.

ANTH 4531 - Alcohol/Drugs/Culture COMM 4373 - Interracial Communication COMM 4410 - Conflict Resolution and Negot CRMJ 4520 - Patterns of Domestic Abuse CRMJ 4530 - Sociology of Murder EDPR 3302 - Child/Adolescent Development PADM 3601 - Public Admin\* (Prerequisite: Junior/Senior Status, ENGL 1010) PADM 4226 - Intro Nonprofit Organizations PSYC 3102 - Abnormal Psychology\* (Prerequisite: PSYC 1030) PSYC 3103 - Child Psychology\* (Prerequisite: PSYC 1030) SOCI 3401 - Social Inequality SOCI 3501 - Sociology of Deviant Behavior SOCI 4420 - Racial Inequality SOCI 4442 - Sociology of Poverty SOCI 4541 - Sociology of Aging SOCI 4852 - Sociology of Mental Illness UNIV 4527 - The Developing Adult

Internship (3 hours)

UNIV 4110 - Internship College Requirements (9 hours)

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (25-31 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours. The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# Information Technology (B.P.S.)

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in Information Technology can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of and fundamentals of administrative leadership in the technological fields; (2) to allow students to reflect upon national and international technological development and communication and the significant social and cultural issues raised in those contexts; and (3) to promote skills in information systems, statistical methods, formal and interpersonal communication, including team and organizational relations.

#### General Education (35-41 hours)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

# **Professional Core (21 hours)**

# Group A: Administration and Supervision (3 hours)

PADM 3601 - Public Admin TECH 4381 - Principles of Supervision MGMT 3610 - Princ Mgmt/Organ Behav LIST 4093 - Special Topics/Leadership **Group B: Organizational Systems (3 hours)** 

PM 4120 - Organization Theory and Behav PADM 4226 - Intro Nonprofit Organizations **Group C: Statistical Methods (3 hours)** 

PBRL 4410 - Public Relations Research SOAA 3350 - Social Statistics SOCI 4510 - Intro to Social Research

# Group D: Written Communications (6 hours)

ENGL 3134 - Computer/Writing/Lit ENGL 3250 - Professional Comm PBRL 3421 - Public Relations Writing Group E: Team & Organizational Relations (3 hours)

COMM 3010 - Integrated Corp Comm COMM 4410 - Conflict Resolution and Negot Group F: International Context (3 hours)

JOUR 4712 - Media and Cultures POLI 4350 - International Law PS 3510 - Internl Political Economy POLS 3010 - Comparative Politics SPAN 3550 - Latin America Country& People Information Technology Concentration (15 hours)

Group A: Management Information Systems Overview (3 hours)

PTMA 3020 - Managing Information Tech MGMT 3220 - Mgmt of Info Systems Group B: Software

UNIV 4706 - Managing Software Development Group C: Files/Operativng Systems (3 hours)

INFS 3700 - Systems Analysis and Design COMP 3050 - Programming Languages Group D: Database Management (3 hours)

CSCI 3222 - Database Mgmt System UNIV 4708 - Business Intelligence Group E: Networks (3 hours)

CSCI 4017 - Intro to Information Assurance INFS 4900 - Business Data Communications College Requirements (9 hours)

#### Thematic Studies (6 hours)

CPLS thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Elective (34-40 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# International Organizational Leadership (B.P.S.)

The Bachelor of Professional Studies with a major in Professional Studies and a concentration in International Organizational Leadership can be gained completely online through the State of Tennessee's TN eCampus Program. The program is designed (1) to promote understanding of the nature of bureaucratic organizations and the fundamentals of administrative leadership; (2) to allow students to reflect upon national and international organizational context and upon significant social and cultural issues raised in those contexts; and (3) to promote skills in formal and interpersonal communication, including sensitivity to international issues and cultural diversity that have an impact upon the quality of work.

#### **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

#### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL

# **Professional Core (21 hours)**

# Group A: Administration and Supervision (3 hours)

PADM 3601 - Public Admin TECH 4381 - Principles of Supervision MGMT 3610 - Princ Mgmt/Organ Behav LIST 4093 - Special Topics/Leadership Group B: Organizational Systems (3 hours)

PM 4120 - Organization Theory and Behav PADM 4226 - Intro Nonprofit Organizations **Group C: Statistical Methods (3 hours)** 

PBRL 4410 - Public Relations Research SOAA 3350 - Social Statistics SOCI 4510 - Intro to Social Research **Group D: Written Communications (3 hours)** 

ENGL 3134 - Computer/Writing/Lit ENGL 3250 - Professional Comm PBRL 3421 - Public Relations Writing Group E: Team & Organizational Relations (3 hours)

COMM 3010 - Integrated Corp Comm COMM 4410 - Conflict Resolution and Negot ORCO 3240 - Organizational Comm

# Group F: International Context (3 hours)

JOUR 4712 - Media and Cultures POLI 4350 - International Law PS 3510 - Internl Political Economy POLS 3010 - Comparative Politics SPAN 3550 - Latin America Country& People International Organizational Leadership Concentration (15 hours)

BMGT 3600 - International Mgmt POLI 4350 International Law PS 3510 International Political Economy POLS 4508 - Theories Internatl Relations COMM 3560 - Intercultural Communtn

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (34-40 hrs)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

Bornblum Judaic Studies explores the experience of the Jewish people within the contexts of world cultures. Non-theological in its orientation, it provides students the opportunity to study related areas, including the history of the Jewish people, the structures and politics of Jewish communities, the Hebrew and Arabic languages, and the religious, intellectual, and aesthetic traditions of the Jewish people.

General Education (35-41 hours)

See Graduation from the University for the University General Education Program requirements. Students who have completed one year of American History in high school are exempted from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.

Coordinated Study (45 hours)

# Lower Division Core (15 hours)

# **Group A: Hebrew Language Core**

HEBR 1010 - Elementary Hebrew I HEBR 1020 - Elementary Hebrew II HEBR 2010 - Intermediate Hebrew I HEBR 2020 - Intermediate Hebrew II Group B: Religious Studies Core

JDST 2850 - Religions of Abraham **Upper Division Core (6 hours)** 

HIST 3275 - History of Jewish People JDST 3601 - Judaism JDST 3801 - Ancient & Medieval Jewish Thought Upper Division Electives (15 hours)

# Group A: Jewish Heritage (6 or 9 hours)

ENGL 4461 - Bible as Literature HIST 3275 - History of Jewish People JDST 3661 - Old Testament JDST 3802 - Modern Jewish Thought JDST 4671 - Jewish Literary Texts JDST 4801 - Jewish Mysticism JDST 4841 - Biblical Archaeology

# Group B: Israel (3 or 6 hours)

JDST 4820 - Political History of Israel JDST 4830 - Israeli/Arab Conflict JDST 4840 - Israel/Antiquity in Modernity

With the permission of the Director of Bornblum Judaic Studies, students may substitute the following courses: JDST 4700-4799 Special Topics and/or JDST 4990 Independent Study for two courses listed under C, OR they may be used to satisfy hours in Group D below.

# Interdisciplinary Electives (9 hours; pick 3)

ARTH 4121 - Ancient Art Near East HIST 4272 - Modern Middle East HIST 4320 - Ancient Near East PHIL 3701 - Human and the Divine POLS 3102 - Religion and Politics SOCI 3860 - Sociology of Religion **Thematic Studies (6 hours; pick 2)** 

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester)

General Electives (25-31 hrs)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Law Enforcement Administration, (B.P.S)

Advising guidelines for the Bachelor of Professional Studies (B.P.S.) degree with a concentration in Law Enforcement Administration are designed for experienced law enforcement professionals who wish to further their careers by completing a program of study designed to increase their skills in management, organizational relations, and communication; their knowledge of the contexts within which law enforcement administration fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce. In most cases, candidates for this degree program will be active duty or retired law enforcement officers at the municipal, county, or state levels, though military police and, in certain circumstances, those whose experience is in private security are eligible as well.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (58 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/ugad/permits/

CJUS 100 is a prerequisite for all other CJUS classes.

# **Organization and Administration Required Core (12 hours)**

ACCT 2010 - Fundamentals of Acct I MGMT 3215 - Management of Human Resources PBRL 3400 - Survey of Public Relations

# Choose one of these courses:

CJUS 4126 - CJUS Admin and Mgmt MGMT 3110 - Organization and Mgmt PADM 3601 - Public Admin TECH 4381 - Principles of Supervision **Team Work and Organizational Relations (6 hours)** 

# COMM 3342 - Communication and Leadership COMM 4011 - Communication in Organizations COUN 4621 - Human Interactions COUN 4781 - Strategy/Crisis Intervention LEGL 3482 - Labor Law MGMT 4420 - Organizational Behavior in Business

#### Written Communication (3 hours)

ENGL 3601 - Technical and Profess Writing ENGL 3604 - Persuasive Writing MGMT 3510 - Business Communications Decision-Making (6 hours)

### Group A (3 hours)

CJUS 3129 - Statistical Methods/CJUS POLS 4101 - Political Statistics SOCI 3311 - Social Statistics

# Group B (3 hours)

CJA 3230 - Police Org/Admin CJUS 3130 - Research Methods CJUS SOCI 3322 - Methods of Social Research

# **Professional Ethics (3 hours)**

CJUS 4130 - Ethical Dilemmas/CJUS LEGL 2400 - Legal Ethics PHIL 3511 - Ethical Theory UNIV 3540 - Ethics & Professionalism

#### **Urban Issues (6 hours**

ANTH 4411 - Urban Anthropology ANTH 4412 - Neighborhood Development ESCI 3451 - Intro/Urban Planning POLS 4222 - Urban Politics SOCI 3112 - Contemporary Social Problems SOCI 4631 - Cities in Change

# **Public Policy Issues (6 hours)**

CJUS 3226 - Police in America LEGL 3487 - Admin Law/Procedure POLS 3213 - Intro to Public Policy SOCI 4842 - Sociology/Occup/Professions Social Issues (3 Hours)

COMM 4373 - Interracial Communication SOCI 3422 - Racial/Ethnc Minorities SOCI 3432 - Sociology of Gender SOCI 4460 - Black/White Women in South **Behavioral Issues (3 hours)** 

CJUS 3540 - Criminology PSYC 3102 - Abnormal Psychology PSYC 3106 - Social Psychology PSYC 3507 - Alcohol/Drugs/Behavior SOCI 3701 - Individual and Society **Pre Assessed Credit (10 hours)** 

A minimum of 10 hours of pre assessed experiential learning work from a POST certified training academy or Military MP training will be accepted with proper documentation. The 10 hours will be applied to the Coordinated Study.

College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (12-17 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Legal Studies, (B.P.S.)

The Legal Studies concentration teaches theoretical and practical aspects of the field of law as a profession. Students are equipped to offer substantive legal support services to firms and agencies or to continue their education in law school. The core curriculum emphasizes four correlated disciplines: (1) theory, process, application, and ethics of law; (2) legal and administrative research and investigation; (3) law-related technologies, and (4) professional decorum and communication skills. Only licensed attorneys are permitted to practice law, but well-trained paralegals and support staff are indispensable to any office that faces critical issues in law, regulatory compliance, or policy. The unique skill sets of Legal Studies graduates are vital not only to law firms but also to corporations, government agencies, courts, law enforcement, health care organizations, non-profits, educational institutions, and a wide range of other professional settings.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found here: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (54 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. CPLS staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# No more than 15 hours of the Legal Studies Professional Core may be satisfied through transfer credit.

# Legal Studies Professional Core (30 hours)

LEGL 2400 - Legal Ethics\* LEGL 2410 - Intro to Law\* LEGL 3150 - Legal Research/Writing I\* LEGL 3410 - Contracts Commercial Law LEGL 3420 - Torts LEGL 3440 - Civil Procedure LEGL 3484 - Bankruptcy Practices LEGL 3486 - Criminal Law & Procedure LEGL 4150 - Legal Research Writing II

UNIV 4110 - Internship\*\*

# \* Students must complete LEGL 2400, LEGL 2410, and LEGL 3150 with a grade of C- or better before enrolling in any upper division (3000-4000 level) LEGL courses.

\*\* A permit is required to enroll in UNIV 4110 (Legal Studies Internship). The program director approves internships and issues permits. In order to be eligible, students must have earned (1) ninety credit-hours and (2) a grade of C- (70%) or better in both LEGL 3150 (Legal Research & Writing I) and LEGL 4150 (Legal Research & Writing II). The internship requires students to perform 150 clock-hours of substantive legal work within a

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

professional legal environment. Although the academic advisors and the program coordinator are available to assist however possible, it is each student's responsibility to find, apply for, and secure his/her own internship prior to seeking a permit for UNIV 4110. Students cannot transfer credit for internships from other schools or programs unless the student and the internship both meet UM's Legal Studies Internship standards, as determined by the program coordinator. For more information and related forms and documents, please visit: http://www.memphis.edu/univcoll/legalstudies/legalstudiesinternship.php

958

# Law-Related Electives (12 hours)

LEGL 3400 - Estates and Probates LEGL 3430 - Business Associations LEGL 3481 - Family Law LEGL 3482 - Labor Law LEGL 3485 - Real Estate Practices LEGL 3487 - Admin Law/Procedure LEGL 4200 - Healthcare Liability LEGL 4300 - Immigration Law POLS 4709 - Mock Trial\*

\*Mock trial is a specialty course offered by the Political Science Department. It is limited to students who audition and are selected for the UM Mock Trial team, which sometimes travels for regional competitions. Eligible students may take the course twice for a total of six credit hours, but only in consecutive semesters (fall and then spring). For more information on permits, auditions, requirements, and offerings, please contact the Political Science Department or visit http://www.memphis.edu/polisci/mock\_trial.htm

# **Interdisciplinary Electives (12 hours)**

Legal Studies students must also take at least 12 hours (four classes) of Interdisciplinary Electives. This course group is meant to offer students the freedom to shape their own learning experience while still adhering to a central theme of modern legal systems in society.

Students seeking to enroll in courses outside of College of Professional & Liberal Studies must obtain the appropriate permits from the department offering the course. Note that all upper-division courses offered by the Fogelman College of Business and Economics require a permit (3000 or 4000-level ACCT, ECON, FIR, MGMT, MKTG). To request a permit for courses at Fogelman College, please visit fcbeacad.memphis.edu/ugad/permits. Many upper-division courses in other departments also have prerequisites or permit restrictions. Students are responsible for knowing and satisfying all course requirements prior to enrollment. For specific information about course descriptions and prerequisites, please see the Undergraduate Catalog, which is available online at: www.memphis.edu/ugcatalog/coursedescrip/index.php

ACCT 3011 - Business Law CJUS 3426 - Corrections in America CJUS 3510 - Law and Society CJUS 3521 - Constitutional Crmnl Procedure CJUS 4130 - Ethical Dilemmas/CJUS CJUS 4170 - Prevention/Deterrence Crime CJUS 4520 - Substantive Criminal Law CJUS 4531 - Issues/Constitutional Rights FIR 3310 - Real Estate Principles FIR 4011 - Retirement and Estate Planning FIR 4310 - Real Estate Law\* HIST 3840 - U S Constitutional History JRSM 4700 - Media Law MGMT 3215 - Management of Human Resources PADM 3601 - Public Admin PADM 4221 - Issues/Urban Admin PHIL 3411 - Contemporary Moral Problems PHIL 3511 - Ethical Theory PHIL 3514 - Biomedical Ethics PHIL 4551 - Social and Political Philosophy POLS 3402 - Legal/Political Thght Modern POLS 4200 - Envrnmntl Law/Policy/Regulatn POLS 4211 - Const Law/National Powers POLS 4212 - Const Law Civil Liberty POLS 4222 - Urban Politics POLS 4405 - Origin/Dev Amer Pol Thought POLS 4415 - African-Am Pol Thght to 1900

# POLS 4416 - African-Am Pol Tht from 1900 POLS 4504 - International Law SOCI 3541 - Criminology

# \*Legal Studies Students may receive degree credit for either LEGL 3485 - Real Estate Law or FIR 4310 - Real Estate Law, but not both.

# **College Requirements (9 hours)**

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: http://www.memphis.edu/univcoll/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

Please note that the Legal Studies Senior Project does not involve the same materials and assignments as the Senior Project for students in other fields of study. Instead of an academic research paper, Legal Studies students analyze a case file and conduct independent legal research to draft a full-length trial brief that is suitable for attorney signature and filing with the court. For more information about the Legal Studies section of Senior Project, please email legalstudies@memphis.edu. For permit and registration information, please contact your academic advisor or the Senior Project Coordinator.

UNIV 4995 - Senior Project (completed during the final semester) General Electives (16-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Manufacturing Technology Management, (Lambuth Campus Only) (B.P.S)

The Bachelor of Professional Studies degree (BPS) with a concentration in Manufacturing Technology Management offers career and advancement opportunities in the manufacturing industry.

The interdisciplinary focus on manufacturing supervisory skills will assist students in advancing their manufacturing careers for those already working in the industry.

Students will learn skills in project planning and evaluation, work design improvement, production control, facility design, occupational safety, and statistical quality control. In addition, they will learn principles of supervision and other management skills.

Those currently in the industry also have the opportunity to use existing work experience for college credit through Experiential Learning Credit.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (54 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Manufacturing Technology Concentration (27 hours)

TECH 3386 - Occupational Safety TECH 3440 - Project Plan/Cost Evaluation TECH 4381 - Principles of Supervision TECH 4460 - Work Design/Improvement TECH 4462 - Quality Improvement TECH 4464 - Production Control Systems TECH 4466 - Facility Design UNIV 4110 – Internship (6) <u>Management Services (27 hours)</u>

# Administration and Supervision (3 hours)

MGMT 3110 - Organization and Mgmt PADM 3601 - Public Admin Organizational Systems (3 hours)

> MGMT 3215 - Management of Human Resources MGMT 4420 - Organizational Behavior in Business PADM 4226 - Intro Nonprofit Organizations PSYC 3508 - Indust/Organizatnl Psyc

# Marketing and Public Relations (3 hours)

MKTG 3010 - Principles of Marketing PBRL 3400 - Survey of Public Relations Team and Organizational Relations (3 hours)

COMM 4011 - Communication in Organizations COMM 4342 - Small Group Communication COMM 4373 - Interracial Communication COMM 4375 - Intercultural Communication COUN 4621 - Human Interactions COUN 4781 - Strategy/Crisis Intervention

# Written Communication (3 hours)

ENGL 3601 - Technical and Profess Writing ENGL 3602 - Professional Editing ENGL 3603 - Engineering Communications ENGL 3604 - Persuasive Writing MGMT 3510 - Business Communications PBRL 3421 - Public Relations Writing

# Social & Cultural Context (3 hours)

CJUS 4180 - Corporate/White Collar Crime CJUS 4235 - Security Management COMM 3003 - Television and Culture SOCI 3422 - Racial/Ethnc Minorities SOCI 3432 - Sociology of Gender SOCI 3831 - Marriage and Family **Political & Economic Context (3 hours)** 

ACCT 3130 - Legal/Social/Political Environ HIST 4824 - Business History POLS 4508 - Theories Internatl Relations POLS 4510 - Politics of Global Economy

# Technology & Culture (3 hours)

COMM 4014 - Communication on the Internet HIST 3035 - Technology/Culture Am History JRSM 3900 - Visual Media PHIL 3512 - Science/Technology/Human Values

#### The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# PHIL 3514 - Biomedical Ethics College Requirements (9 hours)

# **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) **Electives (16-22 Hours)** 

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Music & Entertainment (Lambuth Campus Only), (B.P.S)

The Music and Entertainment (ME) degree is an interdisciplinary program fusing three areas of study: music, business, and technology. This concentration will provide students an understanding of fundamentals in commercial music and will provide them the knowledge to gain employment in the entertainment field.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (55 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Music Core (19 hours)

MUTC 3701 - Theory/Musicianship I\* MUTC 3702 - Theory/Musicianship II\* MUS 1030 - Introduction to Music MUHL 3303 - Western Music History MUHL 4805 - History of Rock and Roll MUAP elective - Ensemble or Applied (4 hours) **\*These courses have been approved only for Lambuth Campus** 

# **Entertainment Core (18 hours)**

MUID 3704 - Recording Studio Tech/Practice MUID 3705 - Cont Sngwrting/Prod Techniques MUID 4201 - Studies in Commercial Music\* MUID 4701 - Music Licensing/Publishing\*

# COMM/MUID/UNIV Elective in Entertainment UNIV 4110 - Internship (1-6 hours) \*These courses have been approved only for Lambuth Campus

# **Business Core (18 hours)**

ACCT 2010 - Fundamentals of Acct I MGMT 3110 - Organization and Mgmt MKTG 3010 - Principles of Marketing PBRL 3400 - Survey of Public Relations Elective- 3 hours Business/Marketing/Mgmt Elective (Upper Division) **Pick 1:** 

PBRL 3421 - Public Relations Writing ENGL 3601 - Technical and Profess Writing College Requirements (9 hours)

# Thematic Studies (6 hours; pick 2)

CPLS thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (15-21 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Non-Profit Development and Administration, (B.P.S.)

The goal of this interdisciplinary curriculum is to help persons understand the role of nonprofit in society and to prepare them to organize, develop, and administer nonprofit organizations. Nonprofit organizations include educational, scientific, religious, and other charitable organizations as well as private foundations, community-based organizations, professional and fraternal associations, and civic and social organizations. The guidelines are designed to serve persons who have worked, or who want to work, within the nonprofit sector as employees, or have served in the community as volunteers. They will want to learn how nonprofit organizations serve the community, to learn about their operation, and their constituencies, and to improve or develop administrative skills in order to work in the nonprofit sector. Persons who wish to enter the nonprofit sector or make a career change will also be served by these guidelines. Graduates of the program will likely enter such careers as communications director, volunteer director, or program director for a nonprofit agency. This curriculum can also prepare for graduate study in master's degree programs in the fields of public administration, applied anthropology, business administration and social work.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# Coordinated Study (60 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

963

# Core Courses (15 hours)

ANTH 4412 - Neighborhood Development or ANTH 3282 - American Communities ECON 3411 - Economics of Social Issues MGMT 3110 - Organization and Mgmt PADM 3601 - Public Admin PADM 4226 - Intro Nonprofit Organizations **Historical Context (3 hours)** 

HIST 3274 - Islamic History since 1405 HIST 3275 - History of Jewish People HIST 3881 - African American History HIST 4831 - History American Family HIST 4851 - History of Women in America HIST 4863 - History/Childhood in America HIST 4871 - U S Urban History Social, Political, Economic Context (6 hours)

# Social, Political, Economic Context (0 nours)

Chooe two courses from at least two different disciplines:

ANTH 4411 - Urban Anthropology CJUS 1100 - Intro/Criminal Justice COMM 4381 - Senior Capstone COUN 4611 - Intro to Counseling COUN 4781 - Strategy/Crisis Intervention COUN 4783 - Alcohol/Drug Abuse Services ECON 2010 - Intro to Macroeconomics PHIL 3511 - Ethical Theory POLS 3211 - State/Local Government POLS 3213 - Intro to Public Policy POLS 4222 - Urban Politics POLS 4223 - Issues/Urban Politics SOCI 3401 - Social Inequality SOCI 3422 - Racial/Ethnc Minorities SOCI 4442 - Sociology of Poverty SOCI 4541 - Sociology of Aging

# Nonprofit Work Setting (3 hours)

ESCI 3451 - Intro/Urban Planning PADM 4221 - Issues/Urban Admin SLS 3103 - Outdoor Rec/Ed Urban America SLS 3205 - Venue Planning and Management SLS 3905 - Leisure/Recr Disabilities SOCI 3860 - Sociology of Religion Skills for Administration & Community Development (21 Hours)

# Marketing & Fund-raising (3 hours)

FIR 4011 - Retirement and Estate Planning PBRL 3400 - Survey of Public Relations MKTG 3010 - Principles of Marketing MKTG 4230 - Services Marketing

# Human Resources (3 hours)

COUN 4621 - Human Interactions MGMT 3215 - Management of Human Resources SLS 3204 - Org Analysis Sport/Leisure The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### **Program Evaluation (3 hours)**

ANTH 4010 - Ethnographic Methods COMM 3330 - Communication Research Methods PADM 4101 - Political Statistics SLS 3305 - Leisure/Recreation Prog Devlp SOCI 3311 - Social Statistics SOCI 3322 - Methods of Social Research

# Accounting (3 hours)

ACCT 2010 - Fundamentals of Acct I ACCT 2020 - Fundamentals of Acct II ACCT 3310 - Cost Accounting ACCT 4540 - Govt/Health/Non-Profit PADM 4227 - Issues/Nonprofit Admin SLS 3605 - Financial Management SLS

# Legal Environment (3 hours)

ACCT 3011 - Business Law LEGL 2410 - Intro to Law POLS 3405 - Intro Law/Jurisprudence SLS 4205 - Legal Aspects SLM

# **Communication (3 hours)**

COMM 4011 - Communication in Organizations COMM 4342 - Small Group Communication COMM 4373 - Internacial Communication COMM 4375 - Intercultural Communication ENGL 3601 - Technical and Profess Writing ENGL 3604 - Persuasive Writing MGMT 3510 - Business Communications **Computer Use & Technology (3 hours)** 

JRSM 3900 - Visual Media MIS 2749 - Foundation/Information Systems SLS 3005 - Computer Applctn Sport/Leisure Internship (6 Hours)

PADM 4231 - Admin Internship UNIV 4110 - Internship College Requirements (9 hours)

#### Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: http://www.memphis.edu/univcoll/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (6-12 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Organizational Leadership, (B.P.S.)

Organizational Leadership is designed to (1) promote understanding of the nature of organizations and the fundamentals of administrative leadership; (2) allow students to reflect upon national and international organizational contexts and upon significant social and cultural issues raised in those contexts; and (3) promote skills in formal and interpersonal communication, including sensitivity to personal issues having an impact upon the quality of accomplishment in the work place.

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# Coordinated Study (33 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

A course taken in one group will not be counted in another group of the Professional Core.

# Administration and Supervision (3 hours)

TECH 4381 - Principles of Supervision\* MGMT 3110 - Organization and Mgmt\* PADM 3601 - Public Admin\* Organizational Systems (3 hours)

MGMT 3215 - Management of Human Resources MGMT 4420 - Organizational Behavior in Business PADM 4226 - Intro Nonprofit Organizations\* Statistical and Research Methods (3 hours)

EDPR 4541 - Fundmntl/Applied Stat Method PADM 4101 - Political Statistics SOCI 3311 - Social Statistics MATH 1530 - Prob/Statistics/Non Calculus

# Written Communications (3 hours)

ENGL 3601 - Technical and Profess Writing ENGL 3604 - Persuasive Writing PBRL 3421 - Public Relations Writing MGMT 3510 - Business Communications

# Team and Organizational Relations (3 hours)

COMM 4011 - Communication in Organizations COMM 4342 - Small Group Communication COMM 4373 - Interracial Communication COMM 4375 - Intercultural Communication COUN 4621 - Human Interactions\* COMM 4341 - Interpersonal Communication COMM 4380 - Communication and Conflict **Political and International Context (3 hours)** 

ACCT 3130 - Legal/Social/Political Environ ACCT 3011 - Business Law HIST 3212 - Latin American Nations HIST 3274 - Islamic History since 1405 HIST 3291 - Modern Asia HIST 3302 - Modern Europe 1800-Present HIST 3881 - African American History POLS 3213 - Intro to Public Policy POLS 3302 - West Europe Govt/Politics POLS 3306 - Latin American Govt/Politics POLS 3309 - Govt/Politics of Mid East POLS 3509 - Contmp Prblm Intl Relation POLS 4307 - Govt and Pol Communist China **Organizational Leadership Concentration (15 hours)** 

# NOTE: No more than 3 courses from any one area

ACCT 3130 - Legal/Social/Political Environ \* COUN 4611 - Intro to Counseling COUN 4621 - Human Interactions \* COUN 4781 - Strategy/Crisis Intervention PBRL 3400 - Survey of Public Relations LEAD 3350 - The Adult Learner MGMT 3110 - Organization and Mgmt \* PADM 3601 - Public Admin \* PADM 4226 - Intro Nonprofit Organizations \* PSYC 3101 - Psychology of Personality PSYC 3106 - Social Psychology TECH 4381 - Principles of Supervision UNIV 4110 - Internship SOCI 3422 - Racial/Ethnc Minorities SOCI 3432 - Sociology of Gender

\*Course is listed in multiple groups, but can only be used to meet ONE degree requirement.

\*\*3 hours may be used toward leadership concentration. An additional 3 hours could be used as elective.

#### **College Requirements (9 hours)**

#### Thematic Studies (6 hours)

CPLS thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester) General Electives (37-43 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

#### Preschool & Child Care Administration, (B.P.S.)

These guidelines are designed for persons seeking careers in the administration of early childhood programs including childcare centers, both forprofit and non-profit; private and public pre-kindergarten programs; Head Start; pre-schools; parents' day out programs; before and after school care; and centers for children with special needs. Also served by these guidelines are persons with experience in childcare settings from a wide variety of backgrounds, including childcare volunteers and aides, as well as teachers and directors. In addition to core content in early childhood professional knowledge, there is course work to develop skills in fiscal management, recruiting and hiring personnel, health and safety management, board relations, marketing and public relations, and liaison with professional associations and regulatory agencies.

# NOTE: This Program DOES NOT lead to teacher licensure. Students interested in gaining a teaching license should contact the College of Education at 678-2728 or visit their website at: http://www.memphis.edu/tep/

967

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found here: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (60 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# Students must earn a grade of "C-" or better in all Coordinated Study courses.

# **Child Development and Family Studies (18 hours)**

# NOTE: No more than 6 hours may be substituted in this section

EDPR 2111 - Development Across Lifespan CDFS 2100 - Intro Fld of Chld Dev& Fam St CDFS 2101 - Family/Global Perspective CDFS 3401 - Parent Child Relations CDFS 4220 - Understand Chldn/Behv/Guide CDFS 4223 - Home/School/Comm Engage Educational Context (9 hours)

SPED 2000 - Foundation/Exceptional Learn ECED 3555 - Obsrv/Assmnt Infant/Erly Ch\* ECED 4500 - Emergent Literacy/Lang Dev\* CDFS 4101 - Int Curr for Early Learners EDPR 4301 - Early Child Dev/Begin Teacher Families and Culture (9 hours)

# Group A: (3 hours)

SOCI 3401 - Social Inequality SOCI 3422 - Racial/Ethnc Minorities SOCI 4420 - Racial Inequality SOCI 4442 - Sociology of Poverty

# Group B: (3 hours)

ANTH 3511 - Culture/Kin/Family ANTH 4411 - Urban Anthropology HIST 4831 - History American Family HIST 4863 - History/Childhood in America SOCI 3831 - Marriage and Family

# Group C: (3 hours)

HIST 4851 - History of Women in America

SOCI 3432 - Sociology of Gender

# **Program Administration (21 hours)**

#### **Fiscal Management (6 hours)**

ACCT 2010 - Fundamentals of Acct I ACCT 2020 - Fundamentals of Acct II Human Resource Management (6 hours)

MGMT 3110 - Organization and Mgmt MGMT 3215 - Management of Human Resources Health and Safety Management (6 hours)

NUTR 2202 - Nutrition HMSE 2102 - ARC First Aid and CPR Marketing and Public Relations (3 hours)

MKTG 3010 - Principles of Marketing PBRL 3400 - Survey of Public Relations Internship (3 hours)

UNIV 4110 - Internship College Requirements (9 hours)

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (13-19 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Religious Studies, (B.L.S.)

The concentration in Religious Studies is designed for students with a diversity of backgrounds and interests in religion. Students who are enrolled in the concentration may be considering employment in fields where a knowledge of different religious traditions would be an asset, such as counseling or social work, or they may be contemplating further study of religion in a theological seminary or religious studies graduate program. Religious Studies is a traditional liberal arts field that helps students to develop skills in critical thinking, the analysis of complex issues, and oral and written expression.

# **General Education (35-41 Hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement.Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. CPLS staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# **Religious Studies Core (12 Hours)**

RLGN 1100 - Introduction to Religion RLGN 3100 - Perspectives on Religion UNIV 3580 - Hebrew and Greek Legacy UNIV 3581 - Faith/Reason/Imagination

# **Religious Context Courses (24 Hours)**

AAAS 4251 - African Religions/Diaspora ENGL 4461 - Bible as Literature HIST 3275 - History of Jewish People JDST 3601 - Judaism JDST 3661 - Old Testament JDST 4511 - Holocaust Studies JDST 4841 - Biblical Archaeology PHIL 3701 - Human and the Divine PHIL 3702 - Philosophy of Religion PHIL 3721 - Chinese Philosophy POLS 3102 - Religion and Politics SOCI 3860 - Sociology of Religion UNIV 3565 - Comparative Christianity UNIV 3585 - Critical Themes Old Testament UNIV 3590 - New Testament **College Requirements (9 Hours)** 

# Thematic Studies (6 hours)

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

# UNIV 4995 - Senior Project (Completed during the final semester)

# **General Electives (29-34 Hours)**

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Technology Management Services - (B.P.S)

Technology Management Services is designed for experienced technicians who wish to enhance their technical expertise while at the same time increasing their skills in management, organizational relations, and communication; their knowledge of contexts within which the management of technology fits; their understanding of workplace issues that can affect productivity; and their ability to manage diversity in the workforce.

# General Education (35-41 hours)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened.

970

# **Coordinated Study (54 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# **Technology Concentration: 24 hours**

# NOTE: 12 hours must be upper division

This includes courses taken from such departments as:

Engineering Engineering Technology Manufacturing Engineering Architecture Mathematics Computer Science Biology Chemistry Physics Earth Sciences and other approved courses.

It is assumed that students will take all technology concentration courses from one area. Students wishing to take a combination of classes from the above areas need permission of the College of Professional & Liberal Studies Executive Dean. A limited number of classes from Management Information Systems (MIS/ISDS) is allowed but cannot make up the entire content of the technology concentration. Students wishing to pursue a career in information technology or management information systems should major in these areas.

# Management Services (30 hours)

# Administration and Supervision (3 hours)

MGMT 3110 - Organization and Mgmt TECH 4381 - Principles of Supervision PADM 3601 - Public Admin Organizational Systems (3 hours)

MGMT 3215 - Management of Human Resources MGMT 4420 - Organizational Behavior in Business PADM 4226 - Intro Nonprofit Organizations PSYC 3508 - Indust/Organizatnl Psyc Marketing and Public Relations (3 Hours)

MKTG 3010 - Principles of Marketing PBRL 3400 - Survey of Public Relations Administrative Skills (3 Hours)

ACCT 2010 - Fundamentals of Acct I MIS 2749 - Foundation/Information Systems Statistical & Research Methods (3 Hours)

SOCI 3311 - Social Statistics EDPR 4541 - Fundmntl/Applied Stat Method SCMS 3711 - Business Analytics - Tools MATH 1530 - Prob/Statistics/Non Calculus MATH 4611 - Intro Applied Statistics

# Team and Organizational Relations (3 Hours)

COMM 4011 - Communication in Organizations COMM 4342 - Small Group Communication COMM 4373 - Interracial Communication COMM 4375 - Intercultural Communication COUN 4621 - Human Interactions COUN 4781 - Strategy/Crisis Intervention Written Communication (3 Hours)

ENGL 3601 - Technical and Profess Writing ENGL 3602 - Professional Editing ENGL 3603 - Engineering Communications ENGL 3604 - Persuasive Writing MGMT 3510 - Business Communications

# Social & Cultural Context (3 Hours)

ANTH 3511 - Culture/Kin/Family ANTH 4412 - Neighborhood Development CJUS 4180 - Corporate/White Collar Crime CJUS 4235 - Security Management COMM 3003 - Television and Culture SLS 3105 - Sport/Leisure as Pop Culture SOCI 3422 - Racial/Ethnc Minorities SOCI 3432 - Sociology of Gender SOCI 3831 - Marriage and Family SOCI 4631 - Cities in Change

#### **Political & Economic Context (3 Hours)**

ACCT 3130 - Legal/Social/Political Environ HIST 4824 - Business History POLS 4510 - Politics of Global Economy ESCI 4430 - Economic Geography Technology & Culture (3 Hours)

COMM 4014 - Communication on the Internet HIST 3035 - Technology/Culture Am History PHIL 3512 - Science/Technology/Human Values PHIL 3514 - Biomedical Ethics College Requirements (9 hours)

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

# Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Electives (6-22 hours)

May be chosen to bring the total number of hours to 120 with a minimum of 42 upper-division hours.

# Urban Studies (B.P.S.)

This program provides a structure of study for students interested in the origin, evolution, and function of cities and metropolitan areas. Courses have been chosen to allow exploration of multiple perspectives on the dynamics of urban change, the causes of urban problems, and the sources of urban innovation. Special emphasis is given to the physical development of communities, and the interaction of that development with the social, economic, and environmental wellbeing of communities. The curriculum considers theories, ideologies, and practices to support solutions to urban and regional problems and offers students opportunities to engage in addressing local challenges with community partners. This course of study prepares students for pursuit of a professional master's degree in a related discipline (e.g., City Planning, Public Policy, Public Administration, etc).

# **General Education (35-41 hours)**

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

# **Coordinated Study (45 hours)**

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

# **Urban Studies Foundations (15 hours)**

PLAN 3451 - Introduction to Planning (Crosslisted with ESCI 3451)
PLAN 4003 - Community Economic Development
PLAN 4201 - Urbanization and Environment (Crosslisted with ESCI 4201)
PLAN 4551 - Urban Planning Studio (Crosslisted with ESCI 4551)
ANTH 4010 - Ethnographic Methods
Urban Studies Support (15 hours)

PLAN 4261 - Plan Sustainable CitiesRegions (Crosslisted with ESCI 4261) PLAN 4004 - Community Organizing ARCH 1211 - History of Architecture 1 ARCH 2212 - History of Architecture 2 ESCI 4515 - Geographic Info Science ESCI 4443 - Transportation Planning ANTH 4412 - Neighborhood Development ECON 4220 - Urban Economics POLS 3211 - State/Local Government

#### **Urban Studies Exploration (15 hours)**

NOTE: May use any of the courses not used toward the Urban Studies Support requirement to satisfy Urban Studies Explorations

PLAN 4002 - Urban Food Security ANTH 3282 - American Communities ANTH 4411 - Urban Anthropology ARCH 1120 - Intro to Architecture + Design ARCH 3221 - Determinants of Modern Design ARCH 3222 - Contemporary Architecture 1 ARCH 4022 - Architecture+Urbanism Seminar ARCH 4023 - Urban Design Seminar ARCH 4231 - Issues in City Building ARCH 4421 - Sustainable Design ESCI 4431 - Urban Geography

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### Senior Project (3 hours)

The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academicallyrelevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester) General Elective (25-31 hours)

Electives may be chosen to bring the total number of hours to 120 with a minimum of 42 upper division hours.

#### Visual Merchandising and Exhibition Design (B.P.S.)

The Visual Merchandising and Exhibition Design concentration is an interdisciplinary program and comprises developing environments such as homes, stores, display windows and other merchandise displays; as well Exhibition Design, including trade shows and installations at large scale events, like pop-up stores.

#### University General Education (35-41 hrs)

See University Undergraduate Catalog for the University General Education Program requirements. Students who have completed one year of American History in high school are exempt from the six credit-hour History General Education Program requirement; otherwise, students will have to meet the History requirement. Catalog can be found at: http://catalog.memphis.edu/content.php?catoid=3&navoid=88#gened

#### Coordinated Study (36 hours)

Many upper-division (3000/4000-level) courses have prerequisites that must be met prior to being permitted to register for those courses. You are responsible for knowing and satisfying all course prerequisites. Some (not all) prerequisites are listed below. For specific information about courses and the prerequisites they may have, please view course descriptions at: Courses-Undergraduate

Many courses also require permits from the department that teaches the course. For example, SWRK and CJUS courses will always need permits from those respective departments. College of Professional & Liberal Studies staff cannot issue permits for courses taught in other departments. ALL 3000/4000 level classes taught by the College of Business (ACCT, ECON, FIR, MGMT, MKTG) require a permit; students must request a permit online at: https://fcbeacad.memphis.edu/permits/

#### Visual Merchandising and Design Core (12 hours)

MRCH 2000 - Visual Imaging for Fashion and Merchandising
 MRCH 2010 - Textiles
 MRCH 3215 - Textiles Applications
 MRCH 3000 - Color and Basic Design Studies and Applications
 Visual Merchandising & Exhibition Design Concentration (24 hours)

MRCH 2004 - Tech Skills for Merchandising MRCH 2050 - Computer Applications for VMED MRCH 2106 - 3D Visual Merchandising MRCH 3204 - Residential Kitchen Planning MRCH 3600 - Consumer Engagement in the Digital Era

#### MRCH 4204 - Furnishing Prblms/Presentatns

#### MRCH 4304 - Trends Housing Home Furnishing

Choose one course from any appropriate upper division courses from Art, Theater, etc. for the remaining 3 hours. Courses from other departments should be discussed with your advisor/program coordinator before registering to determine appropriateness for concentration

#### Senior Year Requirements (6 hours)

#### MRCH 4600 - Senior Seminar

The senior collection is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior collection is intended to fuse all the academic areas that comprise the student's understanding of developing a fashion collection into a relevant example of scholarship to be showcased down the runway. Students will complete a collection of their choice with approval of their senior collection instructor. The senior collection is completed during a student's final semester.

#### UNIV 4110 - Internship College Requirements (9 hours)

#### **Thematic Studies (6 hours)**

College of Professional & Liberal Studies thematic studies course(s) are designed to broaden a student's knowledge of significant themes in social, political, and religious history. Review a complete list of courses: https://www.memphis.edu/cpls/resources/thematic\_studies.php

#### **REQUIRED FOR CONCENTRATION:**

MRCH 4205 - Behavioral Sci Aspects of Clothng MRCH 3050 - Costume History Senior Project (3 hours)

# The senior project is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to fuse the two or more academic areas that comprise the student's coordinated study (major) into an academically-relevant example of scholarship. Students will complete a thesis, task-based, or artistic project on a topic of their choice with approval of their senior project instructor. The senior project is completed during a student's final semester. Students will be assigned to a specific section based on his or her concentration.

UNIV 4995 - Senior Project (Completed during the final semester)

#### Minor

#### Alcohol and Drug Abuse Services Minor

This interdisciplinary minor examines societal alcohol and drug abuse from the perspectives of anthropology, counseling, criminal justice, psychology, and sociology. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

#### **Required Core Courses (6 hours)**

COUN 4783 - Alcohol/Drug Abuse Services (Required) Choose one course:

ANTH 4531 - Alcohol/Drugs/Culture PSYC 3507 - Alcohol/Drugs/Behavior Plus 4 Additional Courses from the Following List (12 Hours)

Students may include the second class in the above list as part of the required courses for this section.

COUN 4781 - Strategy/Crisis Intervention SOCI 3501 - Sociology of Deviant Behavior SOCI 3112 - Contemporary Social Problems SOCI 4851 - Medical Sociology <u>American Studies Minor</u>

The American Studies minor engages students in an examination of the culture and society of the United States, with attention paid to the ways in which Americans express their basic values and give meaning to their institutions and everyday social practices. These values, institutions, and

practices are a reflection, in part, of the different experiences of a people, according to their race, gender, class, and historical roots. This minor provides an opportunity to explore the commonalities and differences among Americans through an interdisciplinary course of study.

#### **Required Core Courses (6 hours)**

Chose two courses from this area; the other two courses may be used in the elective courses if desired.

UNIV 3522 - American Cinema UNIV 3526 - War & American Society UNIV 3531 - Am Exp: Image/Narrative UNIV 3542 - Baseball in America Elective Courses (12 hours)

Select four courses from the following list; may also use the remaining two from the Required Core Courses. No more than two courses from any single department will be accepted.

ANTH 3282 - American Communities COMM 4851 - Film History IICOMM 4856 - Gender and Film ENGL 3325 - Af/Am Lit thru Harlem Ren ENGL 3326 - Af/Am Lit since Harlem Ren ENGL 3327 - American Literature to 1865 ENGL 3328 - American Literature since 1865 HIST 3035 - Technology/Culture Am History HIST 3863 - Social/Intellct History of U S HIST 4851 - History of Women in America MUHL 4801 - American Folk/Popular Music MUHL 4804 - Blues MUHL 4805 - History of Rock and Roll MUHL 4806 - History of Jazz MUHL 4807 - Memphis Music SOCI 3420 - Sociology of the South SOCI 4420 - Racial Inequality Child Development Minor

This interdisciplinary minor will attract students with majors in education, family and consumer studies, human services, nonprofit administration, psychology, social work, and related areas.

NOTE: Students who are pursuing concentrations in Child Development & Family Studies, Early Care & Learning and Preschool & Childcare Administration will not be allowed to pursue this minor as the courses are included in your concentration.

#### **Required Courses (9 hours)**

EDPR 2111 - Development Across Lifespan CDFS 3401 - Parent Child Relations PSYC 3103 - Child Psychology **Plus 9 Additional Upper Division Hours From:** 

ANTH 3511 - Culture/Kin/Family CDFS 3410 - Soc Emotion Lrng Early Child CDFS 4220 - Understand Chldn/Behv/Guide HIST 4863 - History/Childhood in America PSYC 3305 - Psyc Learning/Memory PSYC 4034 - Children Soc Relationships PSYC 4102 – Abnormal Child Psych SWRK 4934 - Child Welfare Policy/Services <u>Religion in Society Minor</u>

This minor examines the role of religion in society throughout history. The minor is open to students majoring in any area within any undergraduate college at The University of Memphis or to special students who wish to enroll in order to take such a program.

#### **Required Courses (6 Hours)**

RLGN 1100 - Introduction to Religion RLGN 3100 - Perspectives on Religion Additional Courses (12 Hours)

> ANTH 4253 - Anthropology of Religion ENGL 4461 - Bible as Literature HIST 3275 - History of Jewish People JDST 2850 - Religions of Abraham JDST 3661 - Old Testament JDST 4511 - Holocaust Studies PHIL 3701 - Human and the Divine UNIV 3565 - Comparative Christianity UNIV 3585 - Critical Themes Old Testament UNIV 3590 - New Testament

# **The Fogelman College of Business & Economics**

977

Damon Fleming, Ph.D., Dean Room 432, Fogelman Business and Economics Administration Building (901) 678-2432 http://www.memphis.edu/fcbe/

Charles A. Pierce, Ph.D. Associate Dean for Academic Programs and Research Room 426, Fogelman Business and Economics Administration Building (901) 678-5402

# Purpose

The function of The Fogelman College of Business and Economics is to provide the basic education at the undergraduate level necessary to prepare a person to enter the profession of business. A significant characteristic of the college is that it provides for concentration in the departments of economics and business, not as a substitute for, but as a part of, a broad liberal education. The undergraduate and graduate programs of the college are fully accredited by the AACSB International (Association to Advance Collegiate Schools of Business International).

# **Mission and Objectives of the Undergraduate Program**

The Fogelman College of Business and Economics strives to provide a learning environment that fosters scholarship, intellectual curiosity, and collegiality. The mission of the undergraduate degree program is to prepare students for meaningful and responsible participation in a broad range of career opportunities in business, government, and institutional settings, or for advanced professional or graduate education. The College is dedicated to helping students acquire the competencies and attitudes for a lifetime of learning as they face the challenges of the future.

The objectives of the undergraduate curriculum at the Fogelman College of Business and Economics are to help students acquire the following knowledge and skills:

# Knowledge

Knowledge of cultural, global, and ethical environment within which businesses operate; an appreciation of the impact of business decisions on society, the enterprise, and individuals; knowledge of mathematics and quantitative methods necessary to effectively analyze business decisions; an understanding of the role and impact of diversity in organizations; and understanding of the management of information and information technology; foundation knowledge in each of the functional departments of business and in-depth understanding of one or more specializations; an awareness of the relationship between academic theory and practice to promote informed decisions under conditions of uncertainty.

# Skills

Ability to integrate knowledge from various disciplines to define business problems and research solutions; critical thinking and decision-making skills essential to solving business problems; communication skills to effectively participate in the business environment and larger society; proficiency in relevant computer applications; ability to contribute within a team environment to enhance organizational effectiveness; ability to analyze ethical situations within the context of the global business environment.

# **Organization of the College**

The Fogelman College of Business and Economics comprises six academic units: School of Accountancy; Department of Economics; Department of Finance, Insurance, and Real Estate; Department of Management; Department of Marketing and Supply Chain Management; and the Department of Business Information and Technology.

These academic units offer a variety of majors and minors, the detailed requirements for which are listed later in this section. The interdisciplinary International Business Program centered in this college offers an undergraduate major in International Business; requirements are listed in the section pertaining to academic department requirements. In addition there are nine research units: Sparks Bureau of Business and Economic Research, Center for Manpower Studies, Center of Innovative Technology Management, Enterprise Simulation and Optimization Lab, Robert Wang Center for International Business, The Methodist LeBonheur Center for Healthcare Economics, Systems Testing Excellence Program (STEP), and the Center for Managing Emerging Technologies.

978

# **General Requirements**

The college curriculum is organized into a lower division and an upper division:

The Lower Division (LD) comprises the freshman and sophomore years, the first four semesters of university work. Courses offered in the lower division are numbered from 1000 through 2999, and the student must register consistently for all lower division requirements until they are completed.

# **Admission To Degree Program:**

To continue into the upper division business courses, all students seeking a degree in the Fogelman College of Business and Economics must (1) complete the following courses with a minimum grade of "C" and a minimum 2.25 GPA. (2.5 GPA. for Accounting majors): ECON 2010, ECON 2020, SCMS 2710 or MATH 1530, ACCT 2010, ACCT 2020, MIS 2749; (2) have accumulated 45 hours of course work including the required 9 hours of English; COMM 2381; MATH 1421, MATH 1830 or MATH 1910 (with a minimum grade of "C"); ECON 2010 ECON 2020; ACCT 2010, ACCT 2020; SCMS 2710 or MATH 1530; MIS 2749.

The Upper Division (UD) comprises all junior and senior years of undergraduate work; courses offered in the upper division are numbered 3000 through 4999. Students must have earned a minimum of 45 credit hours and have met specific course prerequisites with a minimum grade of "C" to be eligible for all 3000- and 4000-level courses. In addition to these requirements, students seeking a degree in the Fogelman College of Business and Economics must have (1) completed all required lower division business courses with a minimum grade of "C" in each; (2) minimum of 2.25 GPA (2.5 for ACCT majors) in all required lower division business courses and (3) 45 hours of course work including MATH 1421, MATH 1830 or MATH 1910 (with a minimum grade of "C), COMM 2381 and 9 hours of English (See B.B.A. Degree Requirements-General Requirements).

# **Retention:**

To graduate from the Fogelman College of Business and Economics, all students must have a minimum grade of a "C" and a 2.00 G.P.A. in the following courses: ACCT 3130, FIR 3410, MGMT 3110, MGMT 3510, MGMT 4710, MKTG 3010, MIS 3210, SCMS 3510, SCMS 3711 and the International Business course. All major courses require a minimum grade of "C" and a minimum 2.00 GPA.

# **B.B.A Requirements**

- To qualify for the Bachelor of Business Administration (B.B.A.) degree, the student must complete a minimum of 120 semester hours with a minimum overall grade point average of 2.00 and meet additional grade point average requirements described below.
- A minimum grade of "C" is necessary in these lower division courses: MATH 1830, MATH 1910, or MATH 1421; SCMS 2710 or MATH 1530; ECON 2010, ECON 2020; ACCT 2010, ACCT 2020; MIS 2749. A minimum grade point average of 2.25 (ACCT majors 2.5) is necessary in these lower division business courses: ACCT 2010, ACCT 2020, ECON 2010, ECON 2020, MIS 2749, and either SCMS 2710 or MATH 1530. A minimum grade of "C" and a minimum grade point average of a 2.00 is necessary for these upper division courses: ACCT 3130, FIR 3410, MGMT 3110, MGMT 3510, MGMT 4710, SCMS 3510, SCMS 3711, MIS 3210, MKTG 3010, and the International Business course.
- B.B.A. students may apply no more than two semester hours of physical activity courses to the minimum degree requirements of 120 semester hours.
- B.B.A. students may apply no more than 6 hours of internship toward their major requirements and no more than 6 hours of independent study toward their major requirements for a maximum of 9 hours combined internship and independent study in the major. Internship and independent study courses must be approved by the department chair.
- All courses used to satisfy specific degree requirements of this college must be taken on a "letter grade" OR "credit by examination" basis. A minimum grade of "C" (or a "S" grade for satisfactory) must be earned in all courses that are used in the lower division business core, the upper division business core, in all business majors and in all business minors. Hours earned on a "credit/no credit" basis are accepted

only in courses that are not required for the student's degree. Courses taken on an "audit" basis cannot be used to satisfy college requirements.

- A surcharge of \$35 per credit hour for 3000 and 4000 level courses and for 6000-9000 level courses has been approved by the Tennessee Board of Regents. The purpose of the surcharge on these business courses is to guarantee the continuous improvement of the college and compliance with the standards of the Association to Advance Collegiate Schools of Business International (AACSB International).
- In The Fogelman College of Business and Economics, students are only allowed to attempt a business course three times. If the student is unsuccessful on the third attempt, he or she must select a major outside of Fogelman College.

Contact the department of your major for information about experiential learning credit.

NOTE: The Fogelman College of Business and Economics accepts a maximum of two semester hours in physical activity courses toward the fulfillment of its degree requirements.

# **Academic Advising**

Every student entering The Fogelman College of Business and Economics will receive advice in the college's Undergraduate Student Services Office. The advisor will assist the student in the selection of appropriate courses and provide the opportunity for meaningful discussion regarding career goals, past academic experience and future academic growth and progress as it relates to the student's development. This assistance, however, does not in any way relieve the student of the primary responsibility of studying the Catalog and fulfilling all the requirements for the degree

# **Residence Requirements**

Residence requirements for a degree in business administration are as follows: (1) the senior year must be completed at the University of Memphis, (2) a minimum of 33 hours of upper division business courses must be taken at the University of Memphis, and (3) 12 of the 33 upper division business administration hours must be in the major field.

A student transferring credits from a two-year (lower division) college must complete a minimum of 60 semester hours in an accredited senior institution.

Students with transfer credit are required to maintain a 2.0 GPA on all courses taken at the University of Memphis

# **Enrollment Priority**

Neither admission by the University of Memphis and The Fogelman College of Business and Economics nor completion of the minimum requirements guarantees admission to any specific course offered by the college. Limited resources may require that enrollment in business classes be based on ranking by Grade Point Average with exceptions being made for graduating seniors.

# I. The Major

Each student, with the assistance of an advisor in the college, not later than the beginning of the junior year, will select a major and, if available, an area of concentration within the major. The specific courses required by each department for the satisfaction of its major are listed in the section following. A major requires a minimum of 21 hours beyond upper division core requirements, and courses used to satisfy one major may not be used toward a second major or a minor. A minimum grade of "C" must be earned for each required course for the major.

# II. Courses Not Applicable Toward B.B.A. Degree

Transitional Academic Studies (DSP) courses may not be used to fulfill the minimum number of hours required for the B.B.A. degree.

# **III.** The Minor

A student whose major is within The Fogelman College of Business and Economics is not required to have a minor; however, such an option is available. A minimum grade of "C" must be earned for each required course in the lower division and upper division business administration core curriculum and in each course required for the minor.

A student whose major is within one of the other colleges of the university may take a minor in one of the academic departments. (See Residence Requirements for The Fogelman College of Business and Economics.)

# Minor

To earn a minor in this college, a transfer student majoring in one of the other colleges of the university or in this college must earn at the University of Memphis a minimum of 6 upper division business administration hours of the total number of hours required for that minor.

See University Residence Requirements in the Graduation from the University section.

# **Transfer Credit**

The official evaluation and acceptance of transfer credit is the responsibility of the Office of Admissions. The Undergraduate Student Services Office of The Fogelman College of Business and Economics, however, will be happy to answer inquiries regarding the applicability of transfer course work for the completion of the B.B.A. degree.

If a student transfers credit in required business courses that are classified as upper division in this college, but were taken as lower division credit or taken at a two-year (lower division) institution, these courses must be repeated or appealed to the chair of the department or the director of the school in which the course is taught. If the appeal is rejected, the student must repeat the course to earn the upper division hours.

# Apply to Graduate

Students must apply to graduate with the University of Memphis by going to the portal (myMemphis), selecting the My Degree tab, and navigating to the "Commencement and graduation" channel.

After the students have applied to graduate, they will receive an email before the start of their graduating semester. The email will be sent only to their University of Memphis email address from the Graduation Analyst. All deadlines are strictly enforced.

# **Honors Programs**

# Admission

Lower Division: Incoming freshmen whose minimum score of 27 on the ACT or its equivalent on other tests are invited to participate and are eligible to enroll in the designated honors sections of this college's lower division courses.

Transfer or students presently enrolled in the University of Memphis are eligible to enroll in the designated honors sections of this college's lower division courses if they have a minimum 3.00 grade point average or the recommendation of a faculty member.

Upper Division: Students must have a minimum 3.25 grade point average in business courses and a 3.00 overall grade point average.

Students will need to complete an application form available from the College Honors Advisor to apply for the Business and Economics Honors Program.

# Retention

The participating honors student must maintain a minimum 3.00 GPA in honors courses, have a minimum 3.25 GPA in all business courses, and a minimum overall GPA of 3.00.

# Requirements

Qualification for "Honors in Business and Economics," requires an Honors Thesis or Senior Honors Experience as determined by the Director of the College Honors Program. A student must also complete successfully (with a minimum grade of B) a minimum of 18 semester hours from the following:

No more than 6 hours from Honors Sections in appropriate 2000 level courses\*. At least 12 hours from Honors Sections in appropriate 3000 or 4000 level courses\*.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

In some circumstances, additional contract work and enrollment in a non-honors section of a required upper division course may be accepted as upper division honors credit. A maximum of 9 hours of upper division honors credit may be contracted.

981

\*The appropriate courses will be decided by the Director of the College Honors Program.

Honors Thesis

A Grade of B or better must be earned in this course in order for the course to satisfy a requirement of graduating "with honors in Business."

# **Certificate Of Achievement**

Students who complete a minimum of 12 hours in Honors course work with a minimum of 3.25 grade point average and a minimum of "B" (3.0) in each of the Honors courses will receive a Certificate of Achievement.

# **Designation Of "With Honors In Business"**

Students who complete 18 hours (meeting the restrictions listed) with an acceptable Honors Thesis or Senior Honors Experience and a minimum 3.25 grade point average in all courses taken in The Fogelman College of Business and Economics, and in all Honors courses taken in this college, with a minimum overall grade point average of 3.0 will have earned the designation of "With Honors in Business" which will appear on the transcript and diploma.

Individual program requirements described in *the University of Memphis Undergraduate Catalog* are subject to change. Please consult the college level advisor for changes that may occur before publication of the next issue of this *Catalog*.

# **Pre-Professional Business Administration Minor**

# Requirements

The Fogelman College of Business and Economics offers a pre-professional minor (30 hours) for students whose major is in another college of the University. Requirements are as follows:

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) or MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)

#### Note

Accounting, economics, and a minimum of 45 credit hours are prerequisites for 3000 level courses.

# **School of Accountancy**

The mission of the bachelor's degree program in Accountancy is to serve the needs of students, the accounting profession, and the general business community through teaching, research and service. Within this mission, the department offers students a balanced integrative approach to business education. In this interdisciplinary view, students must have a broad University General Education Program grounded in nonbusiness courses, a The online catalog can be accessed at: http://catalog.memphis.edu/index.php

strong supporting business acumen, and an interrelated view of accounting to the other departments of business. Specifically, accounting classes synthesize accounting with the financing, investing, and operating functions so that students can develop their critical thinking skills and apply them to making decisions on accounting and other business problems.

982

Overall, the B.B.A. with a major in Accounting is built on the foundation of technical, interpersonal, and communication skills. This focus allows enhancement of careers and leadership to businesses and government units that would strengthen the economic development of communities, state, and nation. Program objectives for the B.B.A. in Accounting are found at https://www.memphis.edu/accountancy/programs/index.php.

# Accounting, (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

Accounting majors must earn a minimum grade of B- in ACCT 2010 and ACCT 2020.

# College and Degree (B.B.A.) Requirements

# Lower Division Business Core Curriculum (21 hours)

No grade below "C" and 2.5 GPA in the following Lower Division Business Core

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) Accounting Major Must Earn a Minimum Grade of BACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Accounting Major Must Earn a Minimum Grade of BECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)

MATH 1421 - Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3)
FIR 3410 - Financial Management \*\* Credit Hours: (3)
MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)
MGMT 3510 - Business Communications \*\* Credit Hours: (3)
MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3)
MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)
SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3)
Choose one of the following international business electives:
ACCT 4625 - Internl Acct/IFRS/US GAAP \*\* Credit Hours: (3)

ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

24 upper division semester hours in Accounting courses as follows:

ACCT 3000 - Career Development for ACCT Credit Hours: (3) ACCT 3110 - Intermediate Accounting I \*\* Credit Hours: (3) ACCT 3120 - Intermediate Accounting II \*\* Credit Hours: (3) ACCT 3310 - Cost Accounting \*\* Credit Hours: (3) ACCT 3510 - Federal Income Tax I \*\* Credit Hours: (3) ACCT 4020 - Accounting Info Technology \*\* Credit Hours: (3) ACCT 4240 - Audit/Assurance Services \*\* Credit Hours: (3) ACCT 4310 - Data Analytics for Accountants Credit Hours: (3)

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

### Typical 4-Year Accounting Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)

Humanities/Fine Arts (3) *

Humanities/Fine Arts (3) *

Elective (1-3)

MATH 1710 - College Algebra Credit Hours: (3)

ENGL 1020 - English Comp/Analysis** Credit Hours: (3)

History (3) *

ECON 2020 - Intro to Microeconomics** Credit Hours: (3)

MIS 2749 - Foundation/Information Systems ** Credit Hours: (3)

SCMS 2710 - Business Analytics -Statistics ** Credit Hours: (3)

or

MATH 1530 - Prob/Statistics/Non Calculus** Credit Hours: (3)
```

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
```

Elective (3)

COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

```
ACCT 3000 - Career Development for ACCT Credit Hours: (3)
ACCT 3110 - Intermediate Accounting I ** Credit Hours: (3)
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
```

```
MIS 3210 - Critical Thinking Using Analytics ** Credit Hours: (3)
ACCT 3120 - Intermediate Accounting II ** Credit Hours: (3)
ACCT 3310 - Cost Accounting ** Credit Hours: (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
SCMS 3711 - Business Analytics - Tools ** Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Senior Year

```
Elective (3)
ACCT 4020 - Accounting Info Technology ** Credit Hours: (3)
```

```
ACCT 3510 - Federal Income Tax I ** Credit Hours: (3)
International Business elective (3)
FIR 3410 - Financial Management ** Credit Hours: (3)
```

```
MGMT 4710 - Strategic Management ** Credit Hours: (3)
ACCT 4240 - Audit/Assurance Services ** Credit Hours: (3)
Elective (3)
SCMS 3510 - Operations Management ** Credit Hours: (3)
ACCT 4310 - Data Analytics for Accountants Credit Hours: (3)
```

#### Semester Totals 30 hrs

Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Accounting Minor**

### Requirements

984

For students whose major is in another college of the University (18 hours):

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ACCT 3110 - Intermediate Accounting I \*\* Credit Hours: (3) ACCT 3120 - Intermediate Accounting II \*\* Credit Hours: (3) ACCT 3310 - Cost Accounting \*\* Credit Hours: (3) ACCT 3510 - Federal Income Tax I \*\* Credit Hours: (3)

For students whose major is in a department in The Fogelman College of Business and Economics (12 hours):

ACCT 3110 - Intermediate Accounting I \*\* Credit Hours: (3) ACCT 3120 - Intermediate Accounting II \*\* Credit Hours: (3) ACCT 3310 - Cost Accounting \*\* Credit Hours: (3) ACCT 3510 - Federal Income Tax I \*\* Credit Hours: (3)

# **Department of Business Information and Technology**

Managers and non-managers alike depend upon information for decision making. To be useful that information must be understandable, timely, thorough, focused on the decision at hand, and in the hands of the appropriate individual. Accomplishing all this is the challenge of Business Information and Technology. It requires a knowledge of individual and/or group behavior, the process of perception (how people select and interpret information), the decision tools they need, computers and communication technology, systems design, managing data, and the impact individual decisions have on the organization.

Program objectives for a B.B.A. in Business Information and Technology are found at https://www.memphis.edu/bitm/index.php

Business Information and Technology includes several specialized areas including Telecommunications, Information Systems, Management and Planning, Statistics, System Development, Data Base Management, and general applications of computers to business.

Many Business Information and Technology courses require substantial hands-on experience in computer labs. Therefore, the department does not allow credit by examination for upper division courses.

# **Business Information and Technology, (B.B.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either: SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from: The online catalog can be accessed at: http://catalog.memphis.edu/index.php MATH 1710 - College Algebra Credit Hours: (3) MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 1421 - Honors Calculus I Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

# C. The Major (27 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### Completion of a minimum of 27 hours, including

MIS 2845 - Applied Program Development I \*\* Credit Hours: (3)

MIS 3770 - System Analysis Methods \*\* Credit Hours: (3)

MIS 3775 - Database/Information Management \*\* Credit Hours: (3)

MIS 3790 - Enterprise Architecture \*\* Credit Hours: (3)

MIS 3885 - Strategic IT Project Management \*\* Credit Hours: (3)

MIS 4800 - Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

#### The additional nine hours will be satisfied by three of the following:

MIS 4160 - Mobile Application Development Credit Hours: (3)

MIS 4310 - Global Information Technology \*\* Credit Hours: (3)

MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)

MIS 4672 - Project Management Tools and Leadership \*\* Credit Hours: (3)

MIS 4681 - Fundamental/Software Testing Credit Hours: (3)

MIS 4682 - Advanced Software Testing Credit Hours: (3)

MIS 4760 - Web Site Development \*\* Credit Hours: (3)

MIS 4845 - Application Program Development III Credit Hours: (3)

MIS 4911 - Internship in Management Information Systems Credit Hours: (1-6)

# D. Electives (10 hours)

# Typical 4-Year Business Information and Technology

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)
Humanities/Fine Arts (3) *
MIS 2749 - Foundation/Information Systems ** Credit Hours: (3)
MATH 1710 - College Algebra Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
History (3) *
Humanities/Fine Arts (3) *
ECON 2020 - Intro to Microeconomics** Credit Hours: (3)
Take either
SCMS 2710 - Business Analytics -Statistics ** Credit Hours: (3)
OR
MATH 1530 - Prob/Statistics/Non Calculus** Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \* Elective (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Elective (3) MIS 2845 - Applied Program Development I \*\* Credit Hours: (3) History (3) \* Natural Science (4) \*

#### Semester Totals 32 hrs

#### Junior Year

MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) Elective (1-3) MIS 3790 - Enterprise Architecture \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) MIS 3885 - Strategic IT Project Management \*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

# Senior Year

```
MIS major elective (3)
MIS major elective (3)
MIS 3775 - Database/Information Management ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
Elective (3)
MIS major elective (3)
MIS 4800 - Strategy/Mgmt/Acquisition ** Credit Hours: (3)
Intl Business elective (3)
MGMT 4710 - Strategic Management ** Credit Hours: (3)
SCMS 3510 - Operations Management ** Credit Hours: (3)
```

Semester Totals 30 hrs

Total Hours: 120-122

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Business Information and Technology Minor**

# Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3) MIS 3790 - Enterprise Architecture \*\* Credit Hours: (3) MIS 4800 - Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

For Students Whose Major Is Within Another College of the University (18 hours):

MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3) MIS 3790 - Enterprise Architecture \*\* Credit Hours: (3) MIS 4800 - Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

# **Project Management Minor**

# Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

#### 2 Courses Chosen by the Student From

MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3) MIS 4160 - Mobile Application Development Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MIS 4760 - Web Site Development \*\* Credit Hours: (3) MIS 4845 - Application Program Development III Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) MGMT 4481 - Teamwork/Group Dynamics in Organizations Credit Hours: (3) MKTG 4080 - Marketing Research \*\* Credit Hours: (3) SCMS 4511 - Supply Chain Strategy Credit Hours: (3)

SCMS 4650 - Supply Management Credit Hours: (3)

#### For Students Whose Major Is Business Information and Technology (12 hours):

MIS 4672 - Project Management Tools and Leadership \*\* Credit Hours: (3)

#### 3 Courses Chosen by the Student From

MIS 4160 - Mobile Application Development Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MIS 4760 - Web Site Development \*\* Credit Hours: (3) MIS 4845 - Application Program Development III Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) MGMT 4481 - Teamwork/Group Dynamics in Organizations Credit Hours: (3) MKTG 4080 - Marketing Research \*\* Credit Hours: (3) SCMS 4511 - Supply Chain Strategy Credit Hours: (3) SCMS 4650 - Supply Management Credit Hours: (3)

#### For Students Whose Major Is Within Another College of the University (18 hours):

MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)

MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3)

MIS 3770 - System Analysis Methods \*\* Credit Hours: (3)

MIS 3775 - Database/Information Management \*\* Credit Hours: (3)

MIS 3885 - Strategic IT Project Management \*\* Credit Hours: (3)

MIS 4672 - Project Management Tools and Leadership \*\* Credit Hours: (3)

# **Systems Testing Minor**

#### Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

MIS 2845 - Applied Program Development I \*\* Credit Hours: (3) MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) MIS 4681 - Fundamental/Software Testing Credit Hours: (3) MIS 4682 - Advanced Software Testing Credit Hours: (3)

For Students Whose Major Is Within Another College of the University (18 Hours):

MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)

MIS 2845 - Applied Program Development I \*\* Credit Hours: (3)

MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3)

MIS 3770 - System Analysis Methods \*\* Credit Hours: (3)

MIS 4681 - Fundamental/Software Testing Credit Hours: (3)

MIS 4682 - Advanced Software Testing Credit Hours: (3)

# **Business Information & Technology (Accelerated B.B.A./M.S.)**

This program permits outstanding undergraduate majors in Business Information & Technology to begin coursework for the Masters of Science in Information Systems during their senior year. Students interested in the accelerated program are encouraged to begin planning for it early in their undergraduate careers, in consultation with both their undergraduate B.B.A. advisor and the M.S.I.S. advisor of the Department of Business Information & Technology.

To be accepted into the Accelerated B.B.A./ M.S. Program, student must have a grade point average of at least 3.00, and must submit two letters of reference and a copy of their transcript to the Department of Business Information & Technology. Each applicant will also complete an interview with the M.S. advisor of the Department.

After being accepted into the program, the student will work closely with his or her undergraduate advisor and master's advisor in order to develop a carefully tailored program of student so that he or she can begin work on the M.S. as they complete the B.B.A.

Students must apply to the ABM program. To continue the Program once they have completed the B.B.A., students must apply for full admission into the Graduate School and into the M.S. Program in Information Systems.

Up to 9 hours of graduate coursework may be applied to both the B.B.A. in BIT and the M.S.I.S. degrees.

Core:

MIS 7605 (3775)

MIS 7650 (4310)

MIS 7610 (3770)

Electives:

MIS 7435 (4760)

MIS 6672 (4672)

MIS 6681 (4681)

MIS 6682 (4682)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

### Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

### Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)

MKTG 4530 - International Marketing \*\* Credit Hours: (3)

### C. The Major (27 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

Completion of a minimum of 27 hours, including MIS 2845 - Applied Program Development I \*\* Credit Hours: (3) MIS 3770 - System Analysis Methods \*\* Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3) MIS 3790 - Enterprise Architecture \*\* Credit Hours: (3) MIS 3885 - Strategic IT Project Management \*\* Credit Hours: (3) MIS 4800 - Strategy/Mgmt/Acquisition \*\* Credit Hours: (3)

# Major electives

The additional nine hours will be satisfied by three of the following:

- MIS 4160 Mobile Application Development Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MIS 4672 - Project Management Tools and Leadership \*\* Credit Hours: (3) MIS 4681 - Fundamental/Software Testing Credit Hours: (3)
- MIS 4682 Advanced Software Testing Credit Hours: (3)
- MIS 4760 Web Site Development \*\* Credit Hours: (3)
- MIS 4845 Application Program Development III Credit Hours: (3)

# D. Electives (10 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# **Department of Economics**

The Business Economics program has two major objectives. The first is to provide majors and minors with a solid foundation in economics and the critical thinking skills needed to make effective decisions.

The second objective is to promote and develop economic literacy throughout the Fogelman College of Business and Economics, the University of Memphis and the local and regional community.

Through the pursuit of these two major objectives, the Department of Economics and its faculty and staff dedicate themselves to the economic education of our students and our community. The learning objectives for the B.B.A. degree in Business Economics are found at https://www.memphis.edu/economics/programs/undergraduate.php.

# **Business Economics - Financial Economics Concentration, (B.B.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)
Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3)
OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

# For students choosing the Business Economics major with a concentration in Financial Economics:

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3) three upper-division economics courses (9 hours) three upper-division FIR courses (9 hours) selected with the approval of the department advisor.

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to

complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

994

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Typical 4 Year Sequence Economics Major: Financial Economics Concentration

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science with lab (4) \*

```
ACCT 2020 - Fundamentals of Acct II ** Credit Hours: (3)
Natural Science with lab (4) *
History (3) *
Humanities/Fine Arts (3) *
Elective (3)
```

#### Semester Totals 32 hrs

#### Junior Year

```
ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3)
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
SCMS 3711 - Business Analytics - Tools ** Credit Hours: (3)
MIS 3210 - Critical Thinking Using Analytics ** Credit Hours: (3)
FIR 3410 - Financial Management ** Credit Hours: (3)
ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)
ECON elective (3)
History (3)
```

#### Semester Totals 30 hrs

#### Senior Year

```
ECON elective (3)

Finance elective (3)

Finance elective (3)

SCMS 3510 - Operations Management ** Credit Hours: (3)

MKTG 3010 - Principles of Marketing ** Credit Hours: (3)

ECON elective (3)

Finance elective (3)

Intl Business elective (3)

MGMT 4710 - Strategic Management ** Credit Hours: (3)

Elective (3)
```

Semester Totals 30 hrs

# **Business Economics**, (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)

MATH 1421 - Honors Calculus | Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

```
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
FIR 3410 - Financial Management ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
```

MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors)
MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3)
MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)
SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510)
SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3)
Choose one of the following international business electives:
ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3)
ECON 4350 - International Econ Credit Hours: (3)
ECON 4351 - International Monetary Theory/Policy Credit Hours: (3)
FIR 4550 - International Finance \*\* Credit Hours: (3)
MGMT 4510 - International Business Communication \*\* Credit Hours: (3)
MGMT 4810 - International Management \*\* Credit Hours: (3)
MIS 4310 - Global Information Technology \*\* Credit Hours: (3)
MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)
MKTG 4530 - International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

#### For students choosing the Business Economics major with no concentration:

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)

six upper-division economics courses (18 hours) selected with the approval of the department advisor.

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Typical 4-Year Business Economics Sequence

#### **Freshman Year**

ENGL 1010 - English Composition\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR

MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

```
ACCT 2020 - Fundamentals of Acct II ** Credit Hours: (3)
Natural Science (4) *
History (3) *
Humanities/Fine Arts (3) *
Elective (3)
```

#### Semester Totals 32 hrs

#### Junior Year

ECON 3310 - Intermediate Microeconomic Theory **Credit Hours:** (3) ACCT 3130 - Legal/Social/Political Environ \*\* **Credit Hours:** (3) SCMS 3711 - Business Analytics - Tools \*\* **Credit Hours:** (3) ECON elective (3) MIS 3210 - Critical Thinking Using Analytics \*\* **Credit Hours:** (3) ECON 3320 - Intermediate Macroeconomic Theory **Credit Hours:** (3) ECON elective (3) FIR 3410 - Financial Management \*\* **Credit Hours:** (3) MGMT 3510 - Business Communications \*\* **Credit Hours:** (3) MGMT 3110 - Organization and Mgmt \*\* **Credit Hours:** (3)

#### Semester Totals 30 hrs

### Senior Year

ECON elective (3) ECON elective (3) Elective (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) ECON elective (3) ECON elective (3) Intl Business elective (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) History (3) \*

#### Semester Totals 30 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Economics, (B.A.)

Program objectives can be found in the Business Economics major in the Fogelman College of Business and Economics section.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours, including

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3)
ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)
18 additional upper division semester hours in economics courses as approved by the department advisor.

# Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

To be considered eligible for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of B in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*.

Obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee. Once accepted to the Honors Degree Program in Economics, the student must

Maintain an average GPA of 3.25 in all economics courses to continue in the program. Have a minimum GPA of 3.5 in all economics courses at graduation.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course.

999

Write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Typical 4-Year Economics Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH\* (3-4) Humanities/Fine Arts\* (3) Elective (3) Foreign Language/B.A. (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) Fine Arts\* (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Foreign Language/B.A. (3)

#### Semester Totals 30-31 hrs

#### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Natural Science\* (4) Elective (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) History\* (3) History\* (3) Elective (3) Natural Science\* (4) Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3)

#### Semester Totals 32 hrs

#### Junior Year

UD elective (3) UD elective (3) UD elective (3) UD ECON elective (3) ECON 3310 - Intermediate Microeconomic Theory **Credit Hours: (3)** UD elective (3) UD elective (3) Elective (3) Elective (3)

#### Semester Totals 30 hrs

#### Senior Year

Elective (3) UD ECON (3) UD ECON (3) UD ECON (3) UD ECON (3) UD Elective (3) Elective (4) Elective (3)

Semester Totals 28 hrs

### Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Business Economics Minor**

### Requirements

### For students whose major is in another college of the University:

18 semester hours in economics courses, including

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) 12 additional upper division hours in courses as approved by the department chair.

# For students whose major is in another department in The Fogelman College of Business and Economics:

#### Either

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) or ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)

#### Plus

nine additional upper division hours in economics approved by the department chair.

# **Economics Minor**

# Requirements

To receive a minor in Economics, a student is required to take 18 credit hours, (six courses) in economics. Six of those hours (two courses) must be ECON (TNe) 2010 and ECON 2020. Of the remaining 12 hours (four courses), all of them must be upper-division courses in economics, i.e., 3000-level or 4000-level courses. One of those courses must be either Microeconomic Theory (ECON 3310) or Macroeconomic Theory (ECON 3320). The other three courses (nine hours) are upper-division elective courses.

# **Business Economics, (Accelerated B.B.A./M.A.)**

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper-division semester hours as follows:

#### For students choosing the Business Economics major with no concentration:

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3) six upper-division economics courses (18 hours) selected with the approval of the department advisor.

# Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Honors Program

To be considered for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of "B" in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*; and obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee.

Once accepted to the Honors Degree Program in Economics, the student must:

Maintain an average GPA of 3.25 in all economics courses to continue in the program; Have a minimum GPA of 3.5 in all economics courses at graduation; Enroll in ECON 3310 - Intermediate Microeconomic Theory and ECON 3320 - Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course; and write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 - Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Accelerated B.B.A./M.A. Program in Economics

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Economics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Economics.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.00 grade point average, and must submit two reference letters and a copy of their transcript to the Economics department. Each applicant will complete an interview with the graduate academic coordinator in economics.

Students must also apply to the Graduate School for the accelerated B.B.A./M.A. program, which allows them to take graduate courses in economics. To continue in the program past the B.B.A., students must apply for full admission into the Graduate School and into the Economics department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Typical 4-Year Business Economics Sequence

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR

MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* Humanities/Fine Arts (3) \* Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) ECON elective (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3) ECON elective (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

# Senior Year

ECON elective (3) ECON elective (3) Elective (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) ECON elective (3) ECON elective (3) Intl Business elective (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) History (3) \*

Semester Totals 30 hrs

Total Hours: 120-122

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Economics, (Accelerated B.A./M.A.)

Program objectives can be found in the Business Economics major in the Fogelman College of Business and Economics section.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (30 hours)

Completion of 30 semester hours, including

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3) ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3) 18 additional upper division semester hours in economics courses as approved by the department advisor.

# Electives

Electives may be chosen to bring the total number of hours to 120.

# Honors Program

To be considered eligible for the Honors Degree Program in Economics, the student must:

Maintain a minimum grade of B in honors sections of both ECON (TNe) 2010 - Intro to Macroeconomics\*\* and ECON 2020 - Intro to Microeconomics\*\*.

1005

Obtain the recommendation of a faculty member in the Department of Economics to the Department Honors Committee. Once accepted to the Honors Degree Program in Economics, the student must

Maintain an average GPA of 3.25 in all economics courses to continue in the program.

Have a minimum GPA of 3.5 in all economics courses at graduation.

- Enroll in ECON 3310 Intermediate Microeconomic Theory and ECON 3320 Intermediate Macroeconomic Theory with an honors contract. Those contracts will be discussed with and approved by the faculty member teaching each course.
- Write an honors thesis. This begins with finding a faculty advisor for the thesis project, discussing a thesis topic, then writing the thesis. The honors thesis typically takes one semester to complete, although work on it can begin early. When working on the honors thesis, the student will enroll in a section of ECON 4996 Honors Thesis in Economics for up to one semester. The completed thesis will be graded by the faculty advisor.

Upon successfully completing all these requirements, the student will be recognized at the commencement ceremony by having their degree conferred "With Honors in Economics." Moreover the student's diploma and the record at the University of Memphis will reflect this accomplishment.

# Accelerated B.A./M.A. Program in Economics

This program allows outstanding undergraduates to begin the coursework for the Master of Arts in Economics during their senior year. Students are encouraged to begin planning to enter the Accelerated B.A./M.A. program early in their undergraduate career, in consultation with their advisor in the Department of Economics.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.A. degree while they also begin the coursework toward their M.A.

To apply, students must have a minimum 3.25 grade point average, and must submit two reference letters and a copy of their transcript to the Economics department. Each applicant will complete an interview with the graduate academic coordinator in economics.

Students must also apply to the Graduate School for the accelerated B.A./M.A. program, which allows them to take graduate courses in economics. To continue in the program past the B.A., students must apply for full admission into the Graduate School and into the Economics department's M.A. program.

Only in ABM programs, up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Typical 4-Year Economics Sequence

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
MATH* (3-4)
Humanities/Fine Arts* (3)
Elective (3)
Foreign Language/B.A. (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Elective (3)
Fine Arts* (3)
ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)
Foreign Language/B.A. (3)
```

#### Semester Totals 30-31 hrs

#### Sophomore Year

```
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
```

```
Natural Science* (4)
Elective (3)
ECON 2020 - Intro to Microeconomics** Credit Hours: (3)
History* (3)
Elective (3)
Natural Science* (4)
Elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
```

#### Semester Totals 32 hrs

#### Junior Year

```
UD elective (3)

UD elective (3)

UD elective (3)

UD ECON elective (3)

ECON 3310 - Intermediate Microeconomic Theory Credit Hours: (3)

UD elective (3)

UD elective (3)

Elective (3)

ECON 3320 - Intermediate Macroeconomic Theory Credit Hours: (3)

UD ECON elective (3)
```

#### Semester Totals 30 hrs

#### Senior Year

Elective (3) UD ECON (3) UD ECON (3) UD ECON (3) UD ECON (3) UD Elective (3) Elective (4) Elective (3)

#### Semester Totals 28 hrs

# Total Hours: 120-121

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# **Department of Finance, Insurance and Real Estate**

The Department of Finance, Insurance, and Real Estate offers the Finance major and the Finance major with a concentration in Real Estate and minors in Business Finance, Banking and Financial Services, Real Estate and Risk Management, Financial Planning and Insurance. The Department

curriculum provides basic concepts, principles and analytical tools essential for business decisions and affords a broad background for effective functioning within each FIR discipline.

1007

Finance majors study the social, economic, regulatory environment, and the theory and techniques of decisions on business firms, including the applied areas of investment, financial institutions, real estate, and risk management and insurance. Finance majors also are strongly encouraged to take FIR 1220 - Personal Financial Management during their first two years of study. FIR 1220 - Personal Financial Management is available to be taken by high school students through the University's dual enrollment program. Program objectives for the B.B.A. in Finance are found at https://www.memphis.edu/finance/programs/index.php.

# Professional Certificates: Chartered Financial Analyst (CFA) Institute, the Certified Financial Planner (CFP) Board Approval, and Professional Real Estate

The Department offers three undergraduate Certificate Programs verifying that each certificate holder possesses initial understanding of topics included in the Chartered Financial Analyst (CFA) Program Candidate Body of Knowledge has completed coursework covering all 72 topics tested on the Certified Financial Planner, CFP®, Certification Exam or has completed all course requirements for the Professional Real Estate Certificate.

The worldwide headquarters of both the Chartered Financial Analyst (CFA) and the Institute the Certified Financial Planner (CFP) Board have admitted the Finance curriculum into its recognized academic programs. This recognition indicates that the Financial Planner Certificate holder meets all 72 educational topic requirements to sit for the CFP exam. The Financial Analyst Certificate indicates that certificate holders have covered at least 70% of the CFA Program Candidate Body of Knowledge, positioning them to apply to sit for the CFA exam. Finance majors are encouraged to take one or both of these advanced financial literacy certifications and to sit for each of these licensing exams.

#### **Financial Analyst Certificate**

Students wishing to receive the Financial Analyst Certificate must take: FIR 3410, 3710, 3720, 4730 and any two of the following: FIR 4331, 4721, 4770, 4911 (internship with a CFA charter holder member). When an appropriate upper-division FIR class is not available, an alternative is to take FIR 4910 (Independent Study in Finance) under the supervision of a faculty member approved by the department chair. Classes taken in conjunction with the Financial Analyst Certificate may count for credit for any students in the B.B.A. Finance major.

Students qualifying for the Financial Analyst Undergraduate Certificate are required to receive a minimum of a B grade in each of the above classes. It is incumbent upon each student to provide his or her qualifications to the department chair in order to receive the certificate. The certificate is issued by the Department of Finance, Insurance, and Real Estate and is not posted on the student's transcript.

#### **Financial Planner Certificate**

The CFP® Certification Education Program Undergraduate Certificate (Financial Planner Certificate) allows students to petition the CFP board regarding his or her completion of the CFP Board Educational Requirements and to sit for the Certified Financial Planner (CFP) exam. Students wishing to receive the Financial Planner Certificate must successfully pass: FIR 3410, 3710, 4011, 4620, 4870, and ACCT 3510. The Financial Planner Certificate is issued by the Department of Finance, Insurance, and Real Estate and is not posted on the student's transcript. The classes taken under this certificate program may also count as credit for any finance major.

Qualifications for either the Financial Analyst Certificate or the CFP® Certification Education Program Certificate (Financial Planner Certificate) may be met in either the FIR undergraduate programs or the FIR graduate programs.

#### **Professional Real Estate Certificate**

A Professional Real Estate Certificate is designed for students who desire careers in real estate or for the real estate professional seeking continuing education. It consists of six required courses (18 hours): FIR 3310, 3410, 4310, 4320, 4340, and 4350. This program is independent of any University of Memphis degree program. No transfer credit will be accepted for these six courses. For non-business degree students, there are no prerequisites required. These classes are available on campus and online.

# Finance (B.B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

# Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

# Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

# The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

```
FIR 3710 - Investments ** Credit Hours: (3)
FIR 3720 - Financial Markets ** Credit Hours: (3)
```

### Finance major requirements

Choose 1 or more courses from the following: FIR 4011 - Retirement and Estate Planning Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) FIR 4710 - Commercial Banking \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3) FIR 4721 - Fixed Income and Derivatives Credit Hours: (3)

Choose 1 or more courses from the following: FIR 4610 - Cases Managerial Finance \*\* Credit Hours: (3) FIR 4620 - Cases in Financial Planning Credit Hours: (3) FIR 4730 - Financial Analysis/Certification \*\* Credit Hours: (3)

Choose courses (up to 4) from the following: FIR 1220 - Personal Financial Management Credit Hours: (3) FIR 2811 - Field Experiences in Finance Credit Hours: (3) FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 3810 - Principles of Risk/Insurance Credit Hours: (3) FIR 4310 - Real Estate Law \*\* Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR 4331 - Stock Portfolio Mgmt Credit Hours: (3) FIR 4340 - Real Estate Appraisal \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3) FIR 4440 - Intermediate Managerial Finance \*\* Credit Hours: (3) FIR 4770 - Security Analysis/Portfolio Management Credit Hours: (3) FIR 4870 - Risk Management \*\* Credit Hours: (3) FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6) ACCT 3510 - Federal Income Tax I \*\* Credit Hours: (3) ECON 3610 - Money and Banking Credit Hours: (3) ECON 4120 - Economic Forecasting Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Typical 4-Year Finance Major Sequence

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
Humanities/Fine Arts (3) \*
FIR 1220 - Personal Financial Management Credit Hours: (3)
or
Elective (1-3)
MATH 1710 - College Algebra Credit Hours: (3)
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
History (3) \*
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3)
OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

Elective (3)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* Elective (3) Humanities/Fine Arts (3) \*

#### Semester Totals 32 hrs

#### Junior Year

FIR 3410 - Financial Management \*\* **Credit Hours:** (3) MIS 3210 - Critical Thinking Using Analytics \*\* **Credit Hours:** (3) SCMS 3711 - Business Analytics - Tools \*\* **Credit Hours:** (3) MGMT 3510 - Business Communications \*\* **Credit Hours:** (3) ACCT 3130 - Legal/Social/Political Environ \*\* **Credit Hours:** (3)

FIR 3710 - Investments \*\* Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) FIR elective (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

FIR 4011 or FIR 4550 or FIR 4710 or FIR 4720 or FIR 4721 (3) FIR elective (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) Elective (3) FIR elective (3)

MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Elective (3) FIR 4610 or FIR 4620 or FIR 4720 (3) International Business elective (3) FIR elective (3)

#### Semester Totals 30 hrs

### Total Hours: 120-122

## Total Hours Required for Graduation: 120

## Finance - Real Estate Concentration, (B.B.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

```
FIR 3710 - Investments ** Credit Hours: (3)
FIR 3720 - Financial Markets ** Credit Hours: (3)
```

## Real Estate concentration (18 hours):

FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3)

```
Choose 3 courses from the following:

FIR 1220 - Personal Financial Management Credit Hours: (3)

FIR 4310 - Real Estate Law ** Credit Hours: (3)

FIR 4340 - Real Estate Appraisal ** Credit Hours: (3)

FIR 4440 - Intermediate Managerial Finance ** Credit Hours: (3)

FIR 4710 - Commercial Banking ** Credit Hours: (3)

FIR 4720 - Management of Financial Institutions ** Credit Hours: (3)

FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)

ESCI 4515 - Geographic Info Science Credit Hours: (3)
```

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Typical 4-Year Real Estate Concentration Sequence

### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Humanities/Fine Arts (3) *
FIR 1220 - Personal Financial Management Credit Hours: (3)
or
Elective (3)
MATH 1710 - College Algebra Credit Hours: (3)
MIS 2749 - Foundation/Information Systems ** Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
History (3) *
ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)
Humanities/Fine Arts (3) *
SCMS 2710 - Business Analytics -Statistics ** Credit Hours: (3)
OR
MATH 1530 - Prob/Statistics/Non Calculus** Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

Natural Science (4) \* Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3)

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) History (3) \* Natural Science (4) \* ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) Elective (1-3)

#### Semester Totals 30-32 hrs

#### Junior Year

```
FIR 3410 - Financial Management ** Credit Hours: (3)
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
SCMS 3711 - Business Analytics - Tools ** Credit Hours: (3)
MIS 3210 - Critical Thinking Using Analytics ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
FIR elective (3)
FIR 3720 - Financial Markets ** Credit Hours: (3)
SCMS 3510 - Operations Management ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
FIR 3310 - Real Estate Principles Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Senior Year

```
FIR 3710 - Investments ** Credit Hours: (3)
FIR 4320 - Real Estate Finance ** Credit Hours: (3)
FIR elective (3)
FIR elective (3)
Elective (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
FIR 4350 - Real Estate Investment ** Credit Hours: (3)
Intl Business elective (3)
MGMT 4710 - Strategic Management ** Credit Hours: (3)
Elective (3)
```

#### Semester Totals 30 hrs

Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Banking and Financial Services Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

Choose 9 hours from the following: FIR 1220 - Personal Financial Management Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) FIR 4710 - Commercial Banking \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3)

For Students Whose Major Is Within Another College at the University (21 hours)

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3)

And 9 hours chosen from the following: FIR 1220 - Personal Financial Management Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) FIR 4710 - Commercial Banking \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3)

## **Business Finance Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics:

9 hours chosen from FIR 1220 or upper division hours in finance approved by the finance undergraduate career advisor or department chair.

For Students Whose Major Is Within Another College at the University (21 hours):

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) FIR 3710 - Investments \*\* Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) Six additional hours from FIR 1220 or upper division hours approved by the finance undergraduate career advisor or department chair

## **Real Estate Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

```
FIR 3310 - Real Estate Principles Credit Hours: (3)
```

FIR 1220 - Personal Financial Management Credit Hours: (3)
FIR 4310 - Real Estate Law \*\* Credit Hours: (3)
FIR 4320 - Real Estate Finance \*\* Credit Hours: (3)
FIR 4340 - Real Estate Appraisal \*\* Credit Hours: (3)
FIR 4350 - Real Estate Investment \*\* Credit Hours: (3)
FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)

For Students Whose Major Is Within Another College at the University (21 Hours):

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3)

#### Nine Hours Chosen From

FIR 1220 - Personal Financial Management Credit Hours: (3) FIR 4310 - Real Estate Law \*\* Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR 4340 - Real Estate Appraisal \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3) FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)

## **Risk Management, Financial Planning and Insurance Minor**

#### Requirements

For Students Whose Major Is in the Fogelman College of Business and Economics (9 hours):

FIR 4870 - Risk Management \*\* Credit Hours: (3)

Choose two courses from the following:

FIR 1220 - Personal Financial Management Credit Hours: (3)

FIR 3710 - Investments \*\* Credit Hours: (3)

FIR 3810 - Principles of Risk/Insurance Credit Hours: (3)

FIR 4011 - Retirement and Estate Planning Credit Hours: (3)

FIR 4620 - Cases in Financial Planning Credit Hours: (3)

For Students Whose Major Is Within Another College at the University (21 hours):

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3)
or equivalent
FIR 4011 - Retirement and Estate Planning Credit Hours: (3)
FIR 4870 - Risk Management \*\* Credit Hours: (3)
and six additional hours from FIR 1220 or upper division hours in insurance or finance approved by the department chair

# **Finance major and Finance major with Real Estate Concentration** (Accelerated B.B.A/M.S)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### Core requirements:

A minimum of 24 upper division semester hours in courses as follows:

```
FIR 3710 - Investments ** Credit Hours: (3)
FIR 3720 - Financial Markets ** Credit Hours: (3)
```

### Finance major

Choose 1 or more courses from the following: FIR 4011 - Retirement and Estate Planning Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) FIR 4710 - Commercial Banking \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3) FIR 4721 - Fixed Income and Derivatives Credit Hours: (3)

Choose 1 or more courses from the following: FIR 4610 - Cases Managerial Finance \*\* Credit Hours: (3) FIR 4620 - Cases in Financial Planning Credit Hours: (3) FIR 4730 - Financial Analysis/Certification \*\* Credit Hours: (3)

Choose courses (up to 4) from the following: FIR 1220 - Personal Financial Management Credit Hours: (3) FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 3810 - Principles of Risk/Insurance Credit Hours: (3) FIR 4310 - Real Estate Law \*\* Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR 4331 - Stock Portfolio Mgmt Credit Hours: (3) FIR 4340 - Real Estate Appraisal \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3) FIR 4440 - Intermediate Managerial Finance \*\* Credit Hours: (3) FIR 4770 - Security Analysis/Portfolio Management Credit Hours: (3) FIR 4870 - Risk Management \*\* Credit Hours: (3) FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6) ACCT 3510 - Federal Income Tax I \*\* Credit Hours: (3) ECON 3610 - Money and Banking Credit Hours: (3) ECON 4120 - Economic Forecasting Credit Hours: (3) MIS 3775 - Database/Information Management \*\* Credit Hours: (3)

## Real Estate concentration (18 hours):

FIR 3310 - Real Estate Principles Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3) FIR 1220 - Personal Financial Management Credit Hours: (3)
FIR 4310 - Real Estate Law \*\* Credit Hours: (3)
FIR 4340 - Real Estate Appraisal \*\* Credit Hours: (3)
FIR 4440 - Intermediate Managerial Finance \*\* Credit Hours: (3)
FIR 4710 - Commercial Banking \*\* Credit Hours: (3)
FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3)
FIR 4911 - Internship in Finance, Insurance, and Real Estate Credit Hours: (1-6)
ESCI 4515 - Geographic Info Science Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Accelerated B.B.A./M.S. in Finance with a major in finance or a finance major with a concentration in Real Estate

This program allows outstanding undergraduates to begin taking graduate courses during their senior year. These students demonstrate that they seek to challenge themselves, which makes them stand out to graduate schools and prospective employers.

In this program students can complete a B.B.A. degree and AT THE SAME TIME complete graduate-level courses that can count toward a M.S. Up to12 hours of graduate course work may be applied to BOTH the undergraduate and graduate programs and this double counting is only available in ABM programs.

Students are encouraged to contact both the undergraduate and graduate academic coordinators early so that they can begin to plan their course of study. To apply, students must have a minimum 3.25 GPA and submit two reference letters and a copy of their transcript to the Department of Finance, Insurance and Real Estate. Each applicant must complete an interview with the graduate academic coordinator in finance, insurance and real estate.

Students must also apply to the Graduate School for the accelerated B.B.A./M.S. program, which allows them to take graduate courses in finance, insurance and real estate.

Continuation in the program beyond the B.B.A. in NOT required. Students wishing to continue past the B.B.A. must apply for full admission into the Graduate School and into the Finance, Insurance and Real Estate Department's M.S. program.

Any graduate coursework will not apply to the undergraduate GPA.

## Typical 4-Year Finance Major Sequence

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \*

FIR 1220 - Personal Financial Management Credit Hours: (3) or Elective (1-3)

MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) History (3) \* ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)

SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR

MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

Elective (3) ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* Elective (3) Humanities/Fine Arts (3) \*

#### Semester Totals 32 hrs

#### Junior Year

```
FIR 3410 - Financial Management ** Credit Hours: (3)
MIS 3210 - Critical Thinking Using Analytics ** Credit Hours: (3)
SCMS 3711 - Business Analytics - Tools ** Credit Hours: (3)
MGMT 3510 - Business Communications ** Credit Hours: (3)
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
```

FIR 3710 - Investments \*\* Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) FIR elective (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

FIR 4011 or FIR 4550 or FIR 4710 or FIR 4720 or FIR 4721 (3) FIR elective (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) Elective (3) FIR elective (3)

MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Elective (3) FIR 4610 or FIR 4620 or FIR 4720 (3) International Business elective (3) FIR elective (3)

#### Semester Totals 30 hrs

#### Total Hours: 120-122

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

### Typical 4-Year Real Estate Concentration Sequence

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Humanities/Fine Arts (3) *
FIR 1220 - Personal Financial Management Credit Hours: (3)
or
Elective (3)
MATH 1710 - College Algebra Credit Hours: (3)
```

```
MIS 2749 - Foundation/Information Systems ** Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
History (3) *
```

```
ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)
```

Humanities/Fine Arts (3) \* SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

```
ACCT 2010 - Fundamentals of Acct I ** Credit Hours: (3)
ENGL 2201 - Literary Heritage ** Credit Hours: (3) *
or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3) *
Natural Science (4) *
Elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II ** Credit Hours: (3)
History (3) *
Natural Science (4) *
ECON 2020 - Intro to Microeconomics** Credit Hours: (3)
```

## Semester Totals 30-32 hrs

#### Junior Year

Elective (1-3)

FIR 3410 - Financial Management \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) FIR elective (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) FIR 3310 - Real Estate Principles Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

FIR 3710 - Investments \*\* Credit Hours: (3) FIR 4320 - Real Estate Finance \*\* Credit Hours: (3) FIR elective (3) Elective (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) FIR 4350 - Real Estate Investment \*\* Credit Hours: (3) Intl Business elective (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Elective (3)

Semester Totals 30 hrs

Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Department of Management**

An effective manager must have competence in many disciplines, an understanding of a wide variety of relationships, and the ability to analyze evolving management requirements. Regardless of the functional specialty, the professional manager must also be a leader of people who knows how to organize and to motivate groups of people serving the goals of the organization.

Program objectives for a B.B.A. in Management are found at https://www.memphis.edu/management/.

Effective adaptation of management to such emergent conditions as the continued growth of science and technology, populations, and large-scale organizational demands a thorough grasp of management process theory including planning, organizing, directing, and controlling of operations.

The Management major is designed to provide students with a basic understanding of management concepts, and theories and principles, which will be useful in all kinds of organizations. All management majors take courses in management principles, business communication, human resources, management, organizational behavior, international management, and strategic management. These courses and others are designed to develop knowledge of organizations and administrative processes and to enhance skills in interpersonal relations, written and oral communication, and work project development and completion. The Management major is intended to promote the development of general knowledge and skills that can be applied in virtually any organizational setting and which will continue to be important in the future. In addition to required core courses in management, students select among several more specialized courses to complete their majors.

## Management - Human Resources Management Concentration, (B.B.A.)

University General Education Program (41 hours)

1021 See University General Education Program for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either: SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from: MATH 1710 - College Algebra Credit Hours: (3) MATH 1830 - Elementary Calculus\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

# For Students Choosing a Major in Management With a Concentration in Human Resources Management:

A minimum of 24 upper division semester hours including

```
MGMT 4240 - Compensation Performance Appraisal ** Credit Hours: (3)

MGMT 4260 - Employee Staffing/Training/Development ** Credit Hours: (3)

MGMT 4420 - Organizational Behavior in Business ** Credit Hours: (3)

MGMT 4461 - Managerial Leadership ** Credit Hours: (3)

either

MGMT 4251 - Employee Relations ** Credit Hours: (3)

or

MGMT 3812 - Managing Employee Wellness ** Credit Hours: (3)

either

MGMT 4510 - International Business Communication ** Credit Hours: (3)

or

MGMT 4810 - International Management ** Credit Hours: (3)

and either

MGMT 4910 - Independent Study Management ** Credit Hours: (1-3)

or

MGMT 4911 - Internship In Mgmt ** Credit Hours: (1-6)
```

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

# Typical 4-Year Management Sequence (concentration in Human Resources Management)

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) History (3) \* Humanities/Fine Arts (3) \* Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

```
Elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Natural Science (4) *
```

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* History (3) \* ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) MGMT 4240 - Compensation Performance Appraisal \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

MGMT 4510 - International Business Communication \*\* Credit Hours: (3) or MGMT 4810 - International Management \*\* Credit Hours: (3) MGMT 4260 - Employee Staffing/Training/Development \*\* Credit Hours: (3) MGMT 4461 - Managerial Leadership \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) Elective (3) MGMT 4251 - Employee Relations \*\* Credit Hours: (3) or MGMT 3812 - Managing Employee Wellness \*\* Credit Hours: (3) MGMT 4911 - Internship In Mgmt \*\* Credit Hours: (1-6) or MGMT 4910 - Independent Study Management \*\* Credit Hours: (1-3) Intl Business elective (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Elective (3)

#### Semester Totals 30 hrs

### Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Management, (B.B.A.)

## University General Education Program (41 hours)

See University General Education Program for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) with a minimum grade of "C", ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

#### For Students Choosing a Major in Management With No Concentration:

A minimum of 24 upper division semester hours including

MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) MGMT 4461 - Managerial Leadership \*\* Credit Hours: (3) and either MGMT 4510 - International Business Communication \*\* Credit Hours: (3) or MGMT 4810 - International Management \*\* Credit Hours: (3)

#### Additional Courses

The additional 12 hours of the 24 hour minimum for the major can be selected from the following:

MGMT 3812 - Managing Employee Wellness \*\* Credit Hours: (3) MGMT 4240 - Compensation Performance Appraisal \*\* Credit Hours: (3) MGMT 4251 - Employee Relations \*\* Credit Hours: (3) MGMT 4260 - Employee Staffing/Training/Development \*\* Credit Hours: (3) MGMT 4481 - Teamwork/Group Dynamics in Organizations Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MGMT 4820 - Advanced Entrepreneurship \*\* Credit Hours: (3) MGMT 4910 - Independent Study Management \*\* Credit Hours: (1-3) MGMT 4911 - Internship In Mgmt \*\* Credit Hours: (1-6)

A Maximum of 6 Hours From the Following Courses:

HPRM 3330 - Managing Hotel and Resort Operations **Credit Hours:** (2) HPRM 3315 - Hospitality Human Resource Mgmt **Credit Hours:** (3) HPRM 4350 - Properties Develomnt/Planning **Credit Hours:** (3) MKTG 3410 - Building Buyer/Seller Relationships **Credit Hours:** (3) MKTG 4470 - Essentials of Negotiation \*\* **Credit Hours:** (3) PADM 4226 - Intro Nonprofit Organizations **Credit Hours:** (3) COMM 4342 - Small Group Communication **Credit Hours:** (3)

### Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

### Typical 4-Year Management Sequence (no concentration)

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) History (3) \* Humanities/Fine Arts (3) \* Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)

SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \*

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

```
Elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Natural Science (4) *
ACCT 2020 - Fundamentals of Acct II ** Credit Hours: (3)
Natural Science (4) *
History (3) *
ECON 2020 - Intro to Microeconomics** Credit Hours: (3)
Elective (3)
```

#### Semester Totals 32 hrs

#### Junior Year

```
MGMT 3510 - Business Communications ** Credit Hours: (3)
MGMT 3110 - Organization and Mgmt ** Credit Hours: (3)
SCMS 3711 - Business Analytics - Tools ** Credit Hours: (3)
MGMT 3215 - Management of Human Resources ** Credit Hours: (3)
MIS 3210 - Critical Thinking Using Analytics ** Credit Hours: (3)
MGMT 4420 - Organizational Behavior in Business ** Credit Hours: (3)
MGMT elective (3)
FIR 3410 - Financial Management ** Credit Hours: (3)
ACCT 3130 - Legal/Social/Political Environ ** Credit Hours: (3)
MKTG 3010 - Principles of Marketing ** Credit Hours: (3)
```

#### Semester Totals 30 hrs

#### Senior Year

```
MGMT 4510 - International Business Communication ** Credit Hours: (3)
or
MGMT 4810 - International Management ** Credit Hours: (3)
MGMT elective (3)
MGMT 4461 - Managerial Leadership ** Credit Hours: (3)
SCMS 3510 - Operations Management ** Credit Hours: (3)
Elective (3)
MGMT elective (3)
MGMT elective (3)
Intl Business elective (3)
MGMT 4710 - Strategic Management ** Credit Hours: (3)
Elective (3)
```

#### Semester Totals 30 hrs

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Entrepreneurship Minor**

### Requirements

For All Majors (18 hours):

UNIV 2555 - Intro Creativity/Innov/Design Credit Hours: (3) MGMT 2820 - Intro to Entrepreneurship \*\* Credit Hours: (3) elective MGMT 4920 - Independent Study in Entrepreneurship Credit Hours: (1-3) MGMT 4921 - Internship in Entrepreneurship Credit Hours: (1-6) or UNIV 4110 - Internship\*\* Credit Hours: (3-6) MGMT 4820 - Advanced Entrepreneurship \*\* Credit Hours: (3)

## **Management Minor**

## Requirements

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (12 hours):

MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) and 6 upper division semester hours in management

For Students Whose Major Is Within Another College of the University (18 hours):

MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) and 6 upper division semester hours in management

## **Department of Marketing and Supply Chain Management**

## **Marketing Management**

The objective of the Marketing and Supply Chain Management Department is to provide a broad view of the marketing process and to develop an understanding of all the factors involved in the marketing of goods and services.

Marketing Management majors study the practical application of marketing concepts, including procedures for developing promotion, pricing, distribution, and sales management strategies. Additionally, instruction is provided in market research, buyer behavior issues, and a variety of market programming topics.

1028

Program objectives for a B.B.A. in Marketing Management are found at https://www.memphis.edu/mscm/programs/index.php.

## **Supply Chain Management**

Supply Chain Management majors study the functions that comprise supply chain management including logistics, purchasing/sourcing, operations, and transportation. Logistics procedures and strategies, warehousing, inventory management, and order processing are covered. Emphasis on analysis of the competitive environment, distribution network alternatives, and customer service aspects provide a background in each functional area to enable students to pursue their areas of interest.

## Marketing Management, (B.B.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A Minimum of 24 Upper Division Semester Hours in Marketing Courses as Follows:

SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) MKTG 4080 - Marketing Research \*\* Credit Hours: (3) MKTG 4550 - MKTG Business Solutions for Sustainability Credit Hours: (3) MKTG 4901 - Management of Marketing Strategies \*\* Credit Hours: (3) and either MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) or MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3)

Three Semester Hours Chosen by the Student From the Following:

MKTG 3320 - Retailing Management \*\* Credit Hours: (3) MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4230 - Services Marketing Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) MKTG 4911 - Marketing Internship Credit Hours: (1-6) SCMS 4620 - Logistics Management Credit Hours: (3)

### Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

### Typical 4-Year Marketing Management Sequence:

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Elective (1-3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) Humanities/Fine Arts (3) \* ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 28-30 hrs

#### Sophomore Year

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

Elective (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) History (3) \* SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Natural Science (4) \*

#### Semester Totals 32 hrs

#### Junior Year

MGMT 3510 - Business Communications \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) MKTG major elective (3) FIR 3410 - Financial Management \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

History (3) \* MKTG 4080 - Marketing Research \*\* Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) or MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) Elective (3) MKTG 4901 - Management of Marketing Strategies \*\* Credit Hours: (3) Intl Business elective (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Semester Totals 30 hrs

Total Hours: 120-122

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## Supply Chain Management, (B.B.A.)

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3)
Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3)
OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)
Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - Internl Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

## The Major (24 hours)

No grade below "C" and a minimum 2.00 GPA in the major.

A minimum of 24 upper division semester hours in supply chain management courses as follows:

SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)
SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3)
SCMS 4620 - Logistics Management Credit Hours: (3)
SCMS 4650 - Supply Management Credit Hours: (3) and either
SCMS 4810 - Problems in Supply Chain Management Credit Hours: (1-6) or
SCMS 4811 - Internship in Supply Chain Management Credit Hours: (1-6)

The remaining six to nine semester hours chosen by the student from the following courses:

ACCT 3310 - Cost Accounting \*\* Credit Hours: (3) MGMT 3215 - Management of Human Resources \*\* Credit Hours: (3) MGMT 4420 - Organizational Behavior in Business \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MIS 3885 - Strategic IT Project Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3) SCMS 4511 - Supply Chain Strategy Credit Hours: (3) SCMS 4512 - Current Topics in Supply Chain Management Credit Hours: (3)

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120.

## Typical 4-Year Supply Chain Management Sequence:

### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) History (3) \* Humanities/Fine Arts (3) \* MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) History (3) \* Humanities/Fine Arts (3) \* ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

or

Elective (3) ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \*

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

Natural Science (4) \* COMM 2381 - Oral Communication \*\* Credit Hours: (3)

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) Natural Science (4) \* SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) Elective (3)

#### Semester Totals 32 hrs

#### Junior Year

MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Major elective (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) SCMS 4620 - Logistics Management Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) Elective (3)

#### Semester Totals 30 hrs

#### Senior Year

SCMS 4650 - Supply Management Credit Hours: (3)
SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3)
Major elective (3)
SCMS 4810 - Problems in Supply Chain Management Credit Hours: (1-6)
or
SCMS 4811 - Internship in Supply Chain Management Credit Hours: (1-6)
FIR 3410 - Financial Management \*\* Credit Hours: (3)
Major elective (if needed) (3)
Intl Business elective (3)

MGMT 4710 - Strategic Management \*\* Credit Hours: (3)

Semester Totals 28-30 hrs

Total Hours: 120-122

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **Marketing Management Minor**

## Requirements

For Students Whose Major Is in Another College of the University (18 hours):

MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)

Six Semester Hours Chosen by the Student From the Following:

MKTG 3320 - Retailing Management \*\* Credit Hours: (3)

MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3)

MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3)

MKTG 4230 - Services Marketing Credit Hours: (3)

MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3)

MKTG 4530 - International Marketing \*\* Credit Hours: (3)

MKTG 4550 - MKTG Business Solutions for Sustainability Credit Hours: (3)

MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3)

SCMS 4620 - Logistics Management Credit Hours: (3)

SCMS 4650 - Supply Management Credit Hours: (3)

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3)

Three Semester Hours Chosen by the Student From the Following:

MKTG 3320 - Retailing Management \*\* Credit Hours: (3) MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4230 - Services Marketing Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) MKTG 4550 - MKTG Business Solutions for Sustainability Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) SCMS 4620 - Logistics Management Credit Hours: (3)

## **Professional Selling Minor**

#### Requirements

For Students Whose Major Is in Another College of the University (18 hours):

MIS 2749 - Foundation/Information Systems \*\* **Credit Hours:** (3) MKTG 3010 - Principles of Marketing \*\* **Credit Hours:** (3) MKTG 3410 - Building Buyer/Seller Relationships **Credit Hours:** (3) MKTG 4470 - Essentials of Negotiation \*\* **Credit Hours:** (3)

6 Semester Hours Chosen by the Student From the Following Courses:

MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) MKTG 3320 - Retailing Management \*\* Credit Hours: (3) SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)

For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3)

3 Semester Hours Chosen by the Student From the Following Courses:

MKTG 3012 - Consumer Behavior \*\* **Credit Hours:** (3) MKTG 3140 - Advertising/Sales Promotion \*\* **Credit Hours:** (3) MKTG 3320 - Retailing Management \*\* **Credit Hours:** (3) SCMS 2610 - Introduction to Supply Chain Management \*\* **Credit Hours:** (3)

## **Social Media Marketing Minor**

#### Requirements

For Students Whose Major Is in Another College of the University (18 hours):

MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) MKTG 4611 - Social Media Internship/Practicum Credit Hours: (1-6)

Plus Any Three of the Following:

COMM 4811 - Media 2.0 Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) MKTG 3012 - Consumer Behavior \*\* Credit Hours: (3) MKTG 3140 - Advertising/Sales Promotion \*\* Credit Hours: (3) MIS 4160 - Mobile Application Development Credit Hours: (3) MIS 4760 - Web Site Development \*\* Credit Hours: (3) JRSM 4910 - Social Media and Society\*\* Credit Hours: (3) For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics (9 hours):

1036

MKTG 3340 - Principles of Social Media Marketing \*\* Credit Hours: (3) MKTG 4630 - Social Media Strategies and Analytics Credit Hours: (3) MKTG 4611 - Social Media Internship/Practicum Credit Hours: (1-6)

## **Supply Chain Management Minor**

#### Requirements

For students whose major is in another college of the University (18 hours):

SCMS 2610 - Introduction to Supply Chain Management \*\* **Credit Hours:** (3) SCMS 2710 - Business Analytics -Statistics \*\* **Credit Hours:** (3) or equivalent SCMS 3510 - Operations Management \*\* **Credit Hours:** (3) SCMS 4620 - Logistics Management **Credit Hours:** (3) SCMS 4650 - Supply Management **Credit Hours:** (3) MGMT 3110 - Organization and Mgmt \*\* **Credit Hours:** (3)

#### For students whose major is Marketing Management (9 hours):

Choose any three of the following courses:

SCMS 4510 - Operations Planning and Resources Management **Credit Hours:** (3) SCMS 4511 - Supply Chain Strategy **Credit Hours:** (3) SCMS 4512 - Current Topics in Supply Chain Management **Credit Hours:** (3) SCMS 4620 - Logistics Management **Credit Hours:** (3) SCMS 4650 - Supply Management **Credit Hours:** (3) SCMS 4810 - Problems in Supply Chain Management **Credit Hours:** (1-6)

For students whose major is in another department in the Fogelman College of Business and Economics (9 hours):

SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)

Two of the Following Courses:

SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3) SCMS 4620 - Logistics Management Credit Hours: (3) SCMS 4650 - Supply Management Credit Hours: (3)

## **International Business**

The International Business major prepares undergraduate business students for entry-level careers in international business fields through a broad, interdisciplinary curriculum that combines theoretical and practical international business study with course work in the liberal arts, including foreign language and area studies. Program objectives for the B.B.A. in International Business are found at https://www.memphis.edu/fcbe/programs/index.php.

## **International Business, (B.B.A.)**

The International Business major prepares undergraduate business students for entry-level careers in international business fields through a broad, interdisciplinary curriculum that combines theoretical and practical international business study with course work in the liberal arts, including foreign language and area studies.

1037

For further information concerning this program, contact the International Business advisor or The Fogelman College of Business and Economics Advising Office.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. Note that MATH 1710, MATH 1830, MATH 1421, or MATH 1910 (Mathematics requirement) and ECON (TNe) 2010 and ECON 2020 (Social/Behavioral Sciences requirement) with a minimum grade of "C" are specified for the B.B.A. degree.

## Lower Division Business Core

No grade below "C" and a minimum of 2.25 GPA in the major

ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)
ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3)
ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3)
MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) Take either:
SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR
MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3) Take one from:
MATH 1710 - College Algebra Credit Hours: (3)
MATH 1830 - Elementary Calculus\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
MATH 1421 - Honors Calculus I Credit Hours: (4)

## Upper Division Business Core

No grade below "C" and a 2.00 GPA in the following Upper Division Business Core:

ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) FIR 3410 - Financial Management \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) MGMT 3510 - Business Communications \*\* Credit Hours: (3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) (Registration limited to graduating seniors) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) (Take SCMS 3711 before SCMS 3510) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) Choose one of the following international business electives: ACCT 4625 - InternI Acct/IFRS/US GAAP \*\* Credit Hours: (3) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3)

### The Major (27 hours)

#### Foreign Language:

6 semester hours in one modern foreign language at or above the 2000 level or equivalent.

Choose 4 International Business Courses From the Following (12 hours):

ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)

#### Choose 2 Additional Courses From the Following (6 hours):

BA 4911 - Internship International Business Credit Hours: (1-6) ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) FIR 4440 - Intermediate Managerial Finance \*\* Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3) MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3) MKTG 4080 - Marketing Research \*\* Credit Hours: (3) MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3) MKTG 4530 - International Marketing \*\* Credit Hours: (3) MIS 4310 - Global Information Technology \*\* Credit Hours: (3) MIS 4321 - Global Outsourcing/Technology Credit Hours: (3) SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3) SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3) SCMS 4511 - Supply Chain Strategy Credit Hours: (3)

Choose 1 (3 hours):

BA 4911 - Internship International Business Credit Hours: (1-6) BA 4910 - Independent Study in International Business Credit Hours: (1-3) Study Abroad

## Electives (13 hours)

Lower division or upper division courses to bring the total of hours earned to 120. See International Business advisor for recommended electives in global and area studies.

### Typical 4-Year International Business Sequence:

#### Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3)

Humanities/Fine Arts (3) \* Foreign Language (3) MIS 2749 - Foundation/Information Systems \*\* Credit Hours: (3) MATH 1710 - College Algebra Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Elective (3) \* Foreign Language (3) ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) SCMS 2710 - Business Analytics -Statistics \*\* Credit Hours: (3) OR MATH 1530 - Prob/Statistics/Non Calculus\*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Sophomore Year

Elective (3) ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) \* or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) \*

Foreign Language (3) Natural Science (4) \*

ACCT 2020 - Fundamentals of Acct II \*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Foreign Language (3) ECON 2020 - Intro to Microeconomics\*\* Credit Hours: (3) Natural Science (4) \*

#### Semester Totals 32 hrs

#### Junior Year

MGMT 3510 - Business Communications \*\* Credit Hours: (3) ACCT 3130 - Legal/Social/Political Environ \*\* Credit Hours: (3) SCMS 3711 - Business Analytics - Tools \*\* Credit Hours: (3) MIS 3210 - Critical Thinking Using Analytics \*\* Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) SCMS 3510 - Operations Management \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) Humanities/Fine Arts (3) \* FIR 3410 - Financial Management \*\* Credit Hours: (3)

#### Semester Totals 30 hrs

#### Senior Year

Major elective (3) Major elective (3) History (3) \* Major elective (3) Major requirement (3) Major elective (3) History (3) \* Elective (1-3) MGMT 4710 - Strategic Management \*\* Credit Hours: (3) Major elective (3)

#### Semester Totals 28 - 30 hrs

#### Total Hours: 120-122

### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

## **International Business Minor**

#### Requirements

# For Students Whose Major Is in Another Department in the Fogelman College of Business and Economics:

12 hours from the following courses with the approval of the International Business advisor:

```
ECON 4350 - International Econ Credit Hours: (3)
ECON 4351 - International Monetary Theory/Policy Credit Hours: (3)
FIR 3720 - Financial Markets ** Credit Hours: (3)
FIR 4440 - Intermediate Managerial Finance ** Credit Hours: (3)
FIR 4550 - International Finance ** Credit Hours: (3)
FIR 4720 - Management of Financial Institutions ** Credit Hours: (3)
MGMT 4510 - International Business Communication ** Credit Hours: (3)
MGMT 4810 - International Management ** Credit Hours: (3)
MIS 4310 - Global Information Technology ** Credit Hours: (3)
MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)
MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3)
MKTG 4080 - Marketing Research ** Credit Hours: (3)
MKTG 4470 - Essentials of Negotiation ** Credit Hours: (3)
MKTG 4530 - International Marketing ** Credit Hours: (3)
SCMS 2610 - Introduction to Supply Chain Management ** Credit Hours: (3)
SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3)
SCMS 4511 - Supply Chain Strategy Credit Hours: (3)
```

#### For Students Whose Major Is in Another College of the University:

The student will take a minimum of 18 hours in The Fogelman College of Business and Economics, at least 9 hours of which must be chosen from the following:

ECON 4350 - International Econ Credit Hours: (3) ECON 4351 - International Monetary Theory/Policy Credit Hours: (3) FIR 3720 - Financial Markets \*\* Credit Hours: (3) FIR 4440 - Intermediate Managerial Finance \*\* Credit Hours: (3) FIR 4550 - International Finance \*\* Credit Hours: (3) FIR 4720 - Management of Financial Institutions \*\* Credit Hours: (3) MGMT 4510 - International Business Communication \*\* Credit Hours: (3) MGMT 4810 - International Management \*\* Credit Hours: (3)

MIS 4310 - Global Information Technology \*\* Credit Hours: (3)

MIS 4321 - Global Outsourcing/Technology Credit Hours: (3)

MKTG 3410 - Building Buyer/Seller Relationships Credit Hours: (3)

MKTG 4080 - Marketing Research \*\* Credit Hours: (3)

MKTG 4470 - Essentials of Negotiation \*\* Credit Hours: (3)

MKTG 4530 - International Marketing \*\* Credit Hours: (3)

SCMS 2610 - Introduction to Supply Chain Management \*\* Credit Hours: (3)

SCMS 4510 - Operations Planning and Resources Management Credit Hours: (3)

SCMS 4511 - Supply Chain Strategy Credit Hours: (3)

# Helen Hardin Honors College

Melinda Jones, Ph.D., Director 105 Honors Hall, (901) 678-2690 http://honors.memphis.edu

The Helen Hardin Honors College provides exceptional educational opportunities for highly motivated and talented students. The College enables students (regardless of major) to take advantage of the more intimate learning environment offered by small classes. Honors faculty members promote active learning and provide excellent teaching, including individualized support and attention.

The College offers special curricular options and the opportunity to earn honors distinction. In most cases, participation in the College does not increase the number of credit hours required for graduation. Classes within the Program span the entire range of the University.

The Honors College encourages and supports opportunities that are designed to enhance the educational experience of its members. The Honors College also coordinates special academic, social, and cultural events for honors students in which they can become part of a community of friends and fellow scholars outside the classroom.

The Helen Hardin Honors College Office is located in Honors Hall on Patterson Street. There is a conference room, quiet study areas, a lounge area, and computer rooms for the use of honors students. The Director and Program staff may be reached at 901-678-2690.

#### **Admission and Retention Standards and Procedures**

National Merit Finalists and recipients of the Cecil C. Humphreys Presidential Scholarship, the Provost's Scholarship, and the Dean's Scholarship Incoming are automatically admissible to the Program upon receipt of their applications. Other incoming freshmen who score a minimum of 27 on the ACT, or its equivalent on other tests, and have a 3.5 high school GPA are invited to apply to the Honors Program. Transfer students or students currently enrolled at the University of Memphis are also eligible for the Honors Program if they have earned an overall grade point average of 3.00 for freshmen and sophomores and 3.25 for juniors and seniors. Students who do not qualify in one of these ways will be considered for provisional admission upon direct application. Letters of recommendation, though not required, may also be submitted.

To be considered for admission, applicants must be admitted to the University of Memphis and complete a separate application for admission to the Honors College. An application for admission may be obtained from the Honors Office or downloaded from the Honors College web site: <a href="http://www.memphis.edu/honors">http://www.memphis.edu/honors</a>.

Honors students are expected to maintain good academic standing to continue in the College; normally this is a minimum cumulative GPA of 3.0 in the freshman and sophomore years, and a minimum of 3.25 cumulative GPA in the junior and senior years. Students whose GPAs fall below the minimum will be allowed one probationary semester to raise their GPAs to the expected level. Students in the Honors College are expected to take a least one honors course each semester in order to maintain the privilege of priority registration and to fulfill scholarship service obligations.

#### The Honors Curriculum and Requirements

The honors curriculum includes honors sections of General Education Program courses and other courses that fulfill core curriculum requirements. Honors programs offered by some departments also offer special honors sections of courses required for the major. Honors sections have the advantage of small class size, specially selected faculty, teaching that emphasizes student participation, and assignments that encourage students to think independently.

In addition to honors sections of regularly offered courses, the Honors College also offers courses designed specifically for honors students. Courses carrying the UNHP subject area are interdisciplinary in nature, designed to explore a particular topic intensively and creatively.

Students also may earn honors credit by designing their own special projects based on independent study, fieldwork, or an internship experience (see UNHP 4900 course descriptions), or by contracting for honors credit within the context of a regularly scheduled course not officially offered as an honors course. Detailed information about earning honors credit through these approaches is available in the Honors Office. A minimum grade of "B" (3.0) is required in each honors course for it to count toward fulfilling the honors course requirement, but regular credit for the course will be earned if the grade is lower than a "B" (3.0).

## Students within the Honors College may pursue one of two tracks leading to "graduation with honors": University Honors or University Honors with Thesis.

University Honors: To attain "University Honors," with transcript and diploma notations, students complete 25 semester hours of honors coursework that includes UNHP 1100 (see UNHP course descriptions). Students must earn a minimum grade of "B" (3.0) in all honors courses and achieve a 3.25 cumulative grade point average.

**University Honors with Thesis:** The highest honor an Honors College student can achieve is "University Honors with Thesis," which carries transcript and diploma notations. To attain this honors designation, students must complete a minimum of 25 semester hours of honors coursework that includes UNHP 1100 and a 3-credit senior honors thesis or project. Student must earn a minimum grade of "B" (3.0) in all honors courses and achieve a 3.25 cumulative grade point average.

1043

The UNHP 1100 course requirements may be waived for students who are accepted into the University Honors College after completing university coursework at the University of Memphis or another institution, with the expectation that they will substitute three semester hours of honors courses for this requirement.

**Departmental or College Honors Programs:** Some academic departments offer honors programs based on work in the major. Academic areas in the Fogelman College of Business and Economics offer a college-wide program for students pursuing the Bachelor of Business Administration, and several disciplines in the College of Arts and Sciences, the College of Communication and Fine Arts, and the Herff College of Engineering offer students the opportunity to earn honors distinction through special projects and independent study.

Generally speaking, students must have a 3.25 cumulative grade point average to pursue and receive department or college honors. Students should consult the specific department or college listing in this Catalog for detailed requirements, or contact the Honors College Office for a listing of departments offering honors work in the major.

#### The Non-Resident Honors Student Award

A limited number of Non-Resident Honors Student Awards are available on a competitive basis to non-resident students who enroll full-time and who are actively pursuing an Honors College designation. This award allows out-of-state students to pay in-state tuition. Students who receive this award are required to maintain good standing with the Honors College, take at least one honors course every semester until they have earned the baccalaureate degree, and work toward graduation with an honors designation. Entering freshmen receive primary consideration for this award. Application forms for admission to the Honors Program and for the Non-Resident Honors Student Award may be obtained by writing to the Helen Hardin Honors College, 105 Honors Hall, University of Memphis, Memphis, TN 38152-6140; by calling 901-678-2690; or by faxing 901-678-5367. Students may also submit an on-line application for the Non-Resident Honors Student Award at <a href="http://honors.memphis.edu">http://honors.memphis.edu</a>

#### **Special Opportunities for Honors Students**

Students in the Honors College participate in an intellectually vibrant atmosphere that extends beyond the classroom. Honors students are challenged by enriched honors courses, interdisciplinary seminars, and conversations with visiting scholars. Students have opportunities to extend their learning beyond the classroom and into the community through internships and public service. Students in the program may elect to live in honors-designated housing, which provides an atmosphere conducive to studying, but at the same time a place where friendships are easily established. Because of the special nature of their contribution to the University, honors students enjoy other privileges as well, including priority registration, extended library borrowing privileges, an honors computer lab, and special ceremonies that recognize outstanding students.

Students in the Honors College are strongly encouraged to participate in undergraduate research opportunities. The Honors College administers the Undergraduate Research Scholar Program that provides students the opportunity to present individual research at student research forums on campus. The Honors College sponsors the Works-in-Progress Symposium (WIPS) held at the University of Memphis each November, which gives all undergraduates an opportunity to present their research. Students who present at WIPS are encouraged to apply for acceptance to the National Conference on Undergraduate Research (NCUR) during the spring semester. Students who attend both WIPS and NCUR, and present at one other approved research forum can earn the designation "Undergraduate Research Scholar" on their transcript. Membership in the Honors College is not required for this transcript designation.

## The Herff College of Engineering

Richard J. Sweigard, Ph.D., P.E. Dean Room 201, Engineering Administration Building (901) 678-4306 http://www.engr.memphis.edu

## Purposes

The mission of the Herff College of Engineering is to provide quality teaching, research, and service programs to the citizens of the state, region and nation. The College provides undergraduate programs in biomedical, civil, computer, electrical, and mechanical engineering, and in engineering technology. Graduate programs are offered in all of the disciplines listed above. Each curriculum is designed to prepare students for practice of the profession in industry, government, or academic institutions. Considerable effort is directed toward breadth as well as depth to provide programs of highest quality.

## Organization

The Herff College of Engineering is organized into the Departments of Biomedical Engineering, Civil Engineering, Electrical and Computer Engineering, Mechanical Engineering, and Engineering Technology. Each department offers a choice of specialized four-year programs leading to baccalaureate degrees. Graduate programs are offered in all of the engineering disciplines listed above.

Freshman students entering the Herff College of Engineering will be advised by the College Academic Advisor, who will assist students with class schedules and facilitate changes of major and other academic needs. After students accumulate an appropriate number of hours, their advising will be transferred to a faculty member in the department of their major.

## **Computer Requirements**

Every year, software tools become more entwined with the practice of the engineering profession. In addition to preparing our students for professional practice by teaching them how to use these tools, our undergraduate curricula employ software tools to efficiently and effectively deliver subject matter expertise, to enhance student-teacher interaction, to assess student learning, and to increase student achievement. Therefore, the faculty of the Herff College of Engineering requires that each student enrolled in the college's programs possess computing resources that meet or exceed certain minimum specifications. Current requirements and specifications are posted here: http://www.memphis.edu/herff/students/index.php.

## **Degree Requirements**

Students must satisfy all university, college, and departmental degree requirement for the degree desired. University requirements may be found in the "Graduation from the University" section of this Catalog. Specific departmental requirements are subject to change and students should consult their advisor regularly to learn of changes that occur.

## **Accelerated BS/MS**

Qualified students are allowed to earn a Bachelor's degree in an approved undergraduate discipline and a Master's degree in five years. Students with high school advanced placement credits may require less time. See the departmental catalog sections for details.

Individual program requirements described in *the University of Memphis Undergraduate Catalog* are subject to change. Please consult the college level advisor for changes that may occur before publication of the next issue of this *Catalog*.

## **Department of Biomedical Engineering**

Biomedical Engineering is a broad field that encompasses many areas related to improving human health such as implant devices, tissue engineering/regeneration, electrophysiological signaling, and biosensors and imaging technologies for the prevention, detection, diagnosis, and treatment of diseases. The program integrates physical, chemical, mathematical, and computational sciences and engineering with biology and medicine.

The curriculum is designed to prepare graduates for professional practice and to provide a foundation for lifelong learning and professional growth. The course of study begins with a strong foundation in mathematics, physics, chemistry, biology, and engineering sciences. Departmental courses during these years build on these foundations to integrate topics in basic sciences and engineering into knowledge in biomedical engineering. The upper division years include a block of electives (noted as BIOM, Engineering and Technical electives in the typical sequence) to allow students, with advisor's assistance, the means to tailor study in a focused portion of the discipline and its supporting fields as desired. The elective hours must be upper division courses. Concepts and efforts in engineering design occur throughout the curriculum and culminate in a senior design project.

The Biomedical Engineering Program at the University of Memphis aims to produce graduates who demonstrate the following within the first few years after graduation:

secure employment in biomedical or related health industries or institutions, pursue professional studies,

pursue opportunities for professional growth, development, and service Graduates of Biomedical Engineering will have demonstrated

an ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics an ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as well as global, cultural, social, environmental, and economic factors

an ability to communicate effectively with a range of audiences

- an ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts
- an ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives

an ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions an ability to acquire and apply new knowledge as needed, using appropriate learning strategies.

The diversity encountered in the profession requires the successful biomedical engineer to have technical and non-technical skills, especially for communication and team efforts. Courses in the humanities and social sciences enhance non-technical skills, and explore the engineer's relationship with, and responsibility to, society. Studies in the sciences and other engineering disciplines provide a broad background for applying multidisciplinary knowledge to find solutions for biomedical problems. Materials in engineering ethics and professionalism are essential because our graduates and the field expect to enrich life and provide solutions with known benefits and defined risks.

This curriculum equips typical Biomedical Engineering graduates of the University of Memphis with the skills, knowledge, and perspectives required for success in a variety of professional roles. These include the ability to conduct project design work, to work collaboratively on projects, to interact and communicate successfully across disciplines and with the public, and to pursue professional careers ranging from research and development, testing and quality control, regulatory, sales and marketing, and advanced studies in engineering, business, medicine, law, or other fields if so desired.

**GRADUATION:** To qualify for the degree of Bachelor of Science in Biomedical Engineering, the student must satisfy University and College requirements, obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, physics, biology, and chemistry courses used to satisfy degree requirements. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

#### Honors in Biomedical Engineering

The Biomedical Engineering Honors Program is for highly motivated and high-achieving students that provides special opportunities to advance the career and professional development of the student. The program aims to develop student talents, interests, and abilities within a curricula, as well as encouraging independence and creativity.

Students are eligible for the honors program in biomedical engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing, and have received approval from the departmental honors committee. The honors program in biomedical engineering requires a minimum of 10 hours of upper-division biomedical engineering honors courses, including both BIOM 4800 BME Honors seminar, and completion of an honors thesis (BIOM 4999). Students who complete the honors program and the requirements for the B.S. in Biomedical Engineering will be recognized at the commencement ceremony by having their degree conferred "With Honors in Biomedical Engineering." Honors designation will also appear on the student's diploma and academic transcript.

# **Biomedical Engineering**, (B.S.B.E.)

## Graduation

To qualify for the degree of Bachelor of Science in Biomedical Engineering, the student must satisfy University and College requirements, obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, physics, biology, and chemistry courses used to satisfy degree requirements. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

# Honors Program

The Biomedical Engineering Honors Program is for highly motivated and high-achieving students that provides special opportunities to advance the career and professional development of the student. The program aims to develop student talents, interests, and abilities within a curriculum, as well as encouraging independence and creativity.

Students are eligible for the honors program in Biomedical Engineering if they have, and maintain, a cumulative GPA of 3.4 with at least junior standing, and have received approval from the departmental honors committee. The honors program in Biomedical Engineering requires a minimum of 10 hours of upper-division biomedical engineering honors courses, including both BIOM 4800 BME Honors seminar, and completion of an honors thesis (BIOM 4999). Students who complete the honors program and the requirements for the B.S. in Biomedical Engineering will be recognized at the commencement ceremony by having their degree conferred "With Honors in Biomedical Engineering." Honors designation will also appear on the student's diploma and academic transcript.

# University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

## Communication:

ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381

### Mathematics:

MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences:

Must be taken in addition to 3 hours from the other specified choices

```
ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)
```

## Natural Science:

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

## History:

American history waived for B.S.B.E. students who have completed one unit of American history in high school.

# College and Degree Requirements (26 hours)

```
MATH 1920 - Calculus II** Credit Hours: (4)
MATH 2110 - Calculus III** Credit Hours: (4)
MATH 2120 - Differential Equations** Credit Hours: (3)
```

### Natural Science (8 hours)

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1)

### Collateral Course (7 hours)

ENGR 1010 - Engineering Problem Solving Credit Hours: (3)
EECE 2201 - Circuit Analysis I Credit Hours: (3)

And
EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1)
Or
EECE 2283 - Electrical Engr/Instrumntation Credit Hours: (3)
And
EECE 2281 - Instrumentation Lab Credit Hours: (1)

## The Major (63 hours)

### Completion of 42 hours from

BIOM 1701 - Introduction to Biomedical Engineering Design Credit Hours: (1) BIOM 1702 - Biomedical Engineering Visualization Credit Hours: (1) BIOM 1720 - Intro Biomed Engr Tools Credit Hours: (3) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) BIOL 1120 - General Biology II Credit Hours: (3) BIOL 2011 - Anat/Physiology | Lab \*\* Credit Hours: (1) or BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) BIOM 2720 - Experimental Design Analysis Credit Hours: (3) CIVL 2131 - Statics Credit Hours: (3) MECH 2320 - Mechanics of Materials Credit Hours: (3) or MECH 2332 - Dynamics Credit Hours: (3) BIOM 3010 - Medical Measurements Credit Hours: (4) BIOM 3110 - Med Physiology/BIOM Credit Hours: (3) or BIOL 3730 - Vertebrate Physiology Credit Hours: (4) BIOM 3710 - Physiological System/Modeling Credit Hours: (3) BIOM 4730 - Biomaterials Credit Hours: (4) BIOM 4760 - Biomed Engr Design Principles Credit Hours: (3) BIOM 4782 - Biomedical Design Practicum Credit Hours: (1) BIOM 4784 - Biomedical Design Studio Credit Hours: (2)

### Completion of 21 hours of

Completion of 21 hours of BIOM, Engineering and Technical electives approved by the advisor. At least 6 hours must be satisfied with BIOM electives. Nine hours of electives must be chosen from upper division engineering courses including BIOM courses. Six hours of technical electives may be chosen from upper division courses in BIOL, BIOM, CHEM, EECE, MATH, MECH, PHYS and TECH. Courses at this level in other departments can be chosen with permission of the chair or the chair's designee. Some courses to meet these requirements are:

1048

BIOM 4720 - Bioelectricity Credit Hours: (4) BIOM 4750 - Biomechanics Credit Hours: (4) BIOM 4702 - Biotechn Tools for BME Res Credit Hours: (3) BIOM 4205 - Intro Biomed and Chem Sensors Credit Hours: (4) BIOM 4393 - Appld Finite Element Analysis Credit Hours: (3) BIOM 4110 - Science of Medicine Credit Hours: (3) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) EECE 3201 - Circuit Analysis II Credit Hours: (4) EECE 3203 - Signals and Systems I Credit Hours: (3) EECE 3211 - Electronics | Credit Hours: (3) EECE 3221 - Matrix Computer Methods Credit Hours: (3) EECE 3240 - Electromagnetic Field Theory Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) MATH 4391 - Partial Differential Eqns | Credit Hours: (3) MATH 4721 - Numerical Analysis Credit Hours: (3) BIOL 3130 - Cell Biology Credit Hours: (3) BIOL 3500 - Micro I/Fundmntl Aspect Credit Hours: (3) BIOL 4380 - Vertebrate Histology Credit Hours: (3) BIOL 4445 - Immunology Credit Hours: (3) BIOL 4511 - BIOCHEMISTRY | Credit Hours: (3) MECH 2311 - Engineering Thermodynamics | Credit Hours: (3) MECH 3331 - Fluid Mechanics Credit Hours: (3) MECH 3335 - Fluid Mechanics Lab Credit Hours: (1) MECH 4324 - Computer Methods in Design Credit Hours: (3) PHYS 3010 - Introduction to Modern Physics Credit Hours: (3) PHYS 3011 - Methods of Theoretical Physics- I Credit Hours: (3) TECH 4472 - Computer Aided Design Credit Hours: (3)

## Policy on repeated courses:

Students must earn a grade of at least "C-" in all BIOM courses applied toward the major, and in all required engineering, chemistry, physics, biology, and mathematical courses. BIOM, BIOL, CHEM, MATH and PHYS courses applicable toward the major may not be taken more than three times.

Any BIOM course and in all required engineering, chemistry, physics, biology, and mathematical courses applicable toward the major may be repeated once to earn a minimum grade of "C-". To repeat a course a second time, a student must apply for and receive special permission from the department Undergraduate Studies Committee. Application information is available from one of the Academic Coordinators. A student may not attempt the same BIOM or any required engineering, chemistry, physics and mathematical courses more than three times, regardless of where it was taken. Courses cross-listed with BIOM (e.g. BIOL 4110, MECH 4365) are also subject to this course repetition policy.

## **Residence Requirements:**

Biomedical Engineering requires that 12 of the last 60 hours required by the University for residency be taken as upper-division engineering courses in the Herff College of Engineering and, specifically, include BIOM 4760, BIOM 4782, and BIOM 4784.

## Typical 4-Year Biomedical Engineering Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) MATH 1910 - Calculus I \*\* Credit Hours: (4) BIOM 1701 - Introduction to Biomedical Engineering Design Credit Hours: (1) BIOM 1702 - Biomedical Engineering Visualization Credit Hours: (1) ENGR 1010 - Engineering Problem Solving Credit Hours: (3) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) MATH 1920 - Calculus II\*\* Credit Hours: (4) BIOM 1720 - Intro Biomed Engr Tools Credit Hours: (3) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)

#### Academic Year Total 34 hrs

#### Sophomore Year

```
BIOL 1110 - General Biology | Credit Hours: (3)
BIOL 1111 - General Biology | Lab Credit Hours: (1)
MATH 2110 - Calculus III** Credit Hours: (4)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
BIOM 2720 - Experimental Design Analysis Credit Hours: (3)
BIOL 1120 - General Biology II Credit Hours: (3)
BIOL 2011 - Anat/Physiology | Lab ** Credit Hours: (1)
    or
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
CIVL 2131 - Statics Credit Hours: (3)
EECE 2201 - Circuit Analysis | Credit Hours: (3)
EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1)
    or
EECE 2283 - Electrical Engr/Instrumntation Credit Hours: (3)
EECE 2281 - Instrumentation Lab Credit Hours: (1)
MATH 2120 - Differential Equations** Credit Hours: (3)
```

#### Academic Year Total 29 hrs

#### Junior Year

BIOM 3010 - Medical Measurements Credit Hours: (4)
ECON 2010 - Intro to Macroeconomics\*\* Credit Hours: (3)
BIOM 3110 - Med Physiology/BIOM Credit Hours: (3)
or
BIOL 3730 - Vertebrate Physiology Credit Hours: (4)
Engineering Elective Credit Hours: (3)
BIOM 4730 - Biomaterials Credit Hours: (4)
ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)
or
ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)
BIOM 3710 - Physiological System/Modeling Credit Hours: (3)
Technical Elective Credit Hours: (3)
MECH 2320 - Mechanics of Materials Credit Hours: (3)
or

#### Senior Year

BIOM 4760 - Biomed Engr Design Principles Credit Hours: (3)
Humanities/Fine Arts Credit Hours: (3)\*\*
BIOM Elective Credit Hours: (3)
Engineering Elective Credit Hours: (3)
BIOM Elective Credit Hours: (3)
BIOM Elective Credit Hours: (3)
Social/Behavioral Sciences Credit Hours: (3)
Humanities/Fine Arts Credit Hours: (3)\*\*
BIOM 4782 - Biomedical Design Practicum Credit Hours: (1)
BIOM 4784 - Biomedical Design Studio Credit Hours: (2)

Academic Year Total 30 hrs

## Total Hours Required for Graduation: 125-126

\*\*Must satisfy University General Education Program Requirement

### Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in an engineering program during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average and must submit two reference letters and a copy of their transcript to their respective engineering department. Each applicant will complete an interview with the graduate academic coordinator in their respective engineering department.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

Only in ABM programs, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# **Department of Civil Engineering**

The Civil Engineering Program is designed to equip students with the knowledge and skills required to identify and solve the technical problems of society in a practical and ethical way.

The Civil Engineering Program at the University of Memphis aims to produce graduates who demonstrate the following within the first few years after graduation:

secured employment in Civil Engineering or related field, meet the expectations of employers of civil engineers, qualified graduates will pursue advanced study if that is consistent with their career plans,

assume/undertake leadership roles in their communities and/or professions.

Graduates of Civil Engineering will have demonstrated:

an ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics an ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as

well as global, cultural, social, environmental, and economic factors

an ability to communicate effectively with a range of audiences

an ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts

an ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives

an ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions an ability to acquire and apply new knowledge as needed, using appropriate learning strategies.

Civil engineering graduates will engage in a broad range of self-development activities that benefit the civil engineering profession and the community. The civil engineering program is greatly enhanced by a diverse student body spanning a wide range of ages, backgrounds, and nationalities.

The Civil Engineering program of study provides an integrated educational experience that combines study in basic and engineering science, the humanities, and the social sciences with practical experience in laboratory experimentation, problem solving, and engineering design. Students may pursue a general course of study or may elect to specialize in water resources or one of the following concentrations: environmental, structural, geotechnical, transportation, or construction engineering.

**GRADUATION:** To qualify for the degree of Bachelor of Science in Civil Engineering, a student must satisfy general university and college requirements, have a minimum grade of "C-" in all engineering, science, and mathematics courses that are applied toward the degree, and complete the Course Sequence . A minimum grade of "C-" must be earned in all CIVL courses that are prerequisites for other CIVL courses before taking those courses. For credits transferred from another institution, only those civil engineering, science, and mathematics courses with a minimum grade of "C-" may be applied toward the degree. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

**HONORS PROGRAM:** Students are eligible for the honors program in Civil Engineering if they have a minimum overall GPA of 3.25 with junior or senior standing or have received approval of the departmental honors committee. The honors program in civil engineering requires 12 hours of upper division honors courses. Those students who complete the program and the regular B.S.C.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Civil Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Civil Engineering.

# Civil Engineering, (B.S.C.E.)

## Graduation

To qualify for the degree of Bachelor of Science in Civil Engineering, a student must satisfy general university and college requirements, have a minimum grade of "C-" in all engineering, science, and mathematics courses that are applied toward the degree, and complete the Course Sequence. For credits transferred from another institution, only those civil engineering, science, and mathematics courses with a minimum grade of "C-" may be applied toward the degree. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

## Honors Program

Students are eligible for the honors program in Civil Engineering if they have a minimum overall GPA of 3.25 with a Junior or Senior standing or have received approval of the departmental honors committee. The honors program in Civil Engineering requires 9 hours of upper division honors courses. Those students who complete the program and the regular B.S.C.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Civil Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Civil Engineering.

## University General Education Program (36 hours)

1052 See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

#### Communication

ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

#### **Mathematics**

MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

#### Natural Science

PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)

#### History

Waived for B.S.C.E. students who have completed one unit of American history in high school.

### College and Degree Requirements (22 hours)

#### Mathematics

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3)

#### **Natural Science**

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1)

Physical Science 1 (One of the Following):

```
BIOL 1110 - General Biology | Credit Hours: (3)
and
BIOL 1111 - General Biology | Lab Credit Hours: (1)
or
ESCI 1040 - Physical Geology Credit Hours: (4)
or
ESCI 1103 - The Human Planet Credit Hours: (4)
```

Physical Science 2 (One of the Following):

PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) and
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) or
CHEM 1120 - General Chemistry II Credit Hours: (3) and
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)

or BIOL 1120 - General Biology II Credit Hours: (3) and BIOL 1121 - General Biol II Lab Credit Hours: (1)

#### **Collateral Courses**

ENGR 1010 - Engineering Problem Solving Credit Hours: (3) MECH 2332 - Dynamics Credit Hours: (3)

### The Major (67 hours)

### Completion of

CIVL 1101 - Civil Engr Measurements Credit Hours: (3) CIVL 1112 - Civil Engr Analysis Credit Hours: (3) CIVL 2101 - Civil Engr Visualization Credit Hours: (3) CIVL 2107 - Civil Engr Computation Credit Hours: (3) CIVL 2131 - Statics Credit Hours: (3) CIVL 3103 - Approx/Uncertainty in Engr Credit Hours: (3) CIVL 3121 - Structural Analysis | Credit Hours: (3) CIVL 3131 - Design of Steel Structures Credit Hours: (3) or CIVL 4135 - Reinforced Concrete Design Credit Hours: (3) CIVL 3137 - Civil Engr Materials Credit Hours: (3) CIVL 3140 - Environmental Systems Engineering Credit Hours: (4) CIVL 4151 - Soil Mechanics Credit Hours: (4) CIVL 3161 - Transportation Systems Engineering Credit Hours: (3) CIVL 3180 - Civil Engr Hydraulics Credit Hours: (3) CIVL 3181 - Hydraulics and Hydrology Credit Hours: (3) CIVL 3182 - Hydraulics and Hydrology Lab Credit Hours: (1) CIVL 3322 - Mechanics of Materials Credit Hours: (3) CIVL 3325 - Mechanics of Materials Lab Credit Hours: (1) CIVL 4111 - Engineering Economics Credit Hours: (3) CIVL 4195 - Professional Practice/Civil En Credit Hours: (3) CIVL 4197 - Review/Engineering Fundamental Credit Hours: (0) CIVL 4199 - Civil Engr Design Credit Hours: (3)

## **Civil Engineering Electives**

Nine hours of civil engineering electives approved by an advisor.

CIVL 4122 - Structural Analysis II Credit Hours: (3)
CIVL 4131 - Intermediate Steel Design Credit Hours: (3)
CIVL 4135 - Reinforced Concrete Design Credit Hours: (3)
or
CIVL 3131 - Design of Steel Structures Credit Hours: (3)
CIVL 4136 - Inter Reinforced Concrete Dsgn Credit Hours: (3)
CIVL 4140 - Environmental Engr Design Credit Hours: (3)
CIVL 4143 - Physical/Chemical Treatment Credit Hours: (3)
CIVL 4144 - Biological Wastewater Treatmnt Credit Hours: (3)
CIVL 4149 - Pump Station Design Credit Hours: (3)
CIVL 4152 - Applied Soil Mechanics Credit Hours: (3)

CIVL 4155 - Pavement Design and Evaluation Credit Hours: (3)

CIVL 4162 - Traffic Engineering Credit Hours: (3)

CIVL 4163 - Airport Planning and Design Credit Hours: (3)

- CIVL 4164 Route Location and Design Credit Hours: (3)
- CIVL 4171 Construction Engineering Credit Hours: (3)
- CIVL 4180 Adv Hydrology/Hydraulics Credit Hours: (3)
- CIVL 4190 Water Resources Planning and Management Credit Hours: (3)
- CIVL 4191 Civil Engr Project Credit Hours: (1-3)
- CIVL 4211 Physical Hydrology Credit Hours: (4)
- CIVL 4900-4910 Special Topics in Civil Engineering Credit Hours: (1-3)

### Concentrations

A student may select courses from the following concentrations to satisfy civil engineering elective requirements. If the student declares a concentration, a minimum of 9 hours from that concentration area is required.

#### **Construction Engineering**

CIVL 4164 - Route Location and Design Credit Hours: (3) CIVL 4171 - Construction Engineering Credit Hours: (3) CIVL 4191 - Civil Engr Project Credit Hours: (1-3) **Environmental Engineering** CIVL 4140 - Environmental Engr Design Credit Hours: (3) CIVL 4143 - Physical/Chemical Treatment Credit Hours: (3) CIVL 4144 - Biological Wastewater Treatmnt Credit Hours: (3) CIVL 4149 - Pump Station Design Credit Hours: (3) CIVL 4180 - Adv Hydrology/Hydraulics Credit Hours: (3) CIVL 4191 - Civil Engr Project **Geotechnical Engineering** CIVL 4152 - Applied Soil Mechanics Credit Hours: (3) CIVL 4155 - Pavement Design and Evaluation Credit Hours: (3) CIVL 4171 - Construction Engineering CIVL 4191 - Civil Engr Project **Structural Engineering** CIVL 4131 - Intermediate Steel Design Credit Hours: (3) CIVL 4135 - Reinforced Concrete Design Credit Hours: (3) or CIVL 3131 - Design of Steel Structures Credit Hours: (3) CIVL 4136 - Inter Reinforced Concrete Dsgn Credit Hours: (3) CIVL 4152 - Applied Soil Mechanics CIVL 4191 - Civil Engr Project CIVL 4122 - Structural Analysis II Credit Hours: (3) **Transportation Engineering** CIVL 4155 - Pavement Design and Evaluation CIVL 4162 - Traffic Engineering Credit Hours: (3) CIVL 4163 - Airport Planning and Design Credit Hours: (3) CIVL 4164 - Route Location and Design CIVL 4191 - Civil Engr Project

## Typical 4-Year Civil Engineering Sequence

#### Freshman Year

#### Fall Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) CIVL 1101 - Civil Engr Measurements Credit Hours: (3) CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) The online catalog can be accessed at: http://catalog.memphis.edu/index.php ENGR 1010 - Engineering Problem Solving Credit Hours: (3) Total Hours: 17

#### Spring Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3)
MATH 1920 - Calculus II\*\* Credit Hours: (4)
CIVL 1112 - Civil Engr Analysis Credit Hours: (3)
PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)
Physical Science 1 Credit Hours: (4)
BIOL 1110 - General Biology | Credit Hours: (3)
and
BIOL 1111 - General Biology | Lab Credit Hours: (1)

ESCI 1040 - Physical Geology Credit Hours: (4) or ESCI 1103 - The Human Planet Credit Hours: (4) Total Hours: 18

Academic Year Total 35 hrs

#### Sophomore Year

```
Fall Semester
ENGL 2201 - Literary Heritage ** Credit Hours: (3)
    or
ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3)
MATH 2110 - Calculus III** Credit Hours: (4)
Physical Science 2 Credit Hours: (4)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
    and
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
    or
CHEM 1120 - General Chemistry II Credit Hours: (3)
    and
CHEM 1121 - General Chemistry II Lab Credit Hours: (1)
    or
BIOL 1120 - General Biology II Credit Hours: (3)
    and
BIOL 1121 - General Biol II Lab Credit Hours: (1)
CIVL 2101 - Civil Engr Visualization Credit Hours: (3)
CIVL 2131 - Statics Credit Hours: (3)
    Total Hours: 17
    Spring Semester
CIVL 2107 - Civil Engr Computation Credit Hours: (3)
Social/Behavioral Sciences Credit Hours: (3)*
Humanities/Fine Arts Credit Hours: (3)*
MATH 2120 - Differential Equations** Credit Hours: (3)
MECH 2332 - Dynamics Credit Hours: (3)
CIVL 3322 - Mechanics of Materials Credit Hours: (3)
    Total Hours: 18
```

Academic Year Total 35 hrs

### Junior Year

#### Fall Semester

CIVL 3137 - Civil Engr Materials Credit Hours: (3) CIVL 3325 - Mechanics of Materials Lab Credit Hours: (1) CIVL 3180 - Civil Engr Hydraulics Credit Hours: (3) CIVL 3121 - Structural Analysis | Credit Hours: (3) Humanities/Fine Arts Credit Hours: (3)\* CIVL 3103 - Approx/Uncertainty in Engr Credit Hours: (3) **Total Hours: 16** Spring Semester CIVL 3131 - Design of Steel Structures Credit Hours: (3) or CIVL 4135 - Reinforced Concrete Design Credit Hours: (3) CIVL 3161 - Transportation Systems Engineering Credit Hours: (3) CIVL 3140 - Environmental Systems Engineering Credit Hours: (4) CIVL 4151 - Soil Mechanics Credit Hours: (4) CIVL 3182 - Hydraulics and Hydrology Lab Credit Hours: (1) **Total Hours: 15** 

### Academic Year Total 31 hrs

#### Senior Year

Fall Semester CIVL 3181 - Hydraulics and Hydrology Credit Hours: (3) ENGL 3603 - Engineering Communications Credit Hours: (3) CIVL 4111 - Engineering Economics Credit Hours: (3) CIVL 4195 - Professional Practice/Civil En Credit Hours: (3) CIVL 4197 - Review/Engineering Fundamental Credit Hours: (0) CIVL Elective Credit Hours: (3) Total Hours: 15

#### Spring Semester

CIVL 4199 - Civil Engr Design Credit Hours: (3)
Social/Behavioral Sciences Credit Hours: (3)\*
CIVL Elective Credit Hours: (3)
CIVL Elective Credit Hours: (3)
Total Hours: 12

### Academic Year Total 27 hrs

## Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

## Accelerated B.S.C.E./M.S. Program in Civil Engineering

This program allows outstanding undergraduates to earn a Bachelor's degree and Master's degree in Civil Engineering in as little as five years by taking graduate-level technical electives that will count toward both degree programs. Specifically, students who are selected into this program can satisfy the undergraduate requirement of nine hours of technical electives by taking 6000-level courses that will then be counted toward their graduate degree program. However, the graduate coursework will not apply to the undergraduate GPA.

Students are encouraged to begin planning to enter the Accelerated B.S.C.E/M.S. program early in their undergraduate career in consultation with their advisor in the Department of Civil Engineering. Students with a minimum GPA of 3.25 may apply for the accelerated program once they have completed 15 credit hours of 3000-level CIVL coursework.

1057

In addition to an application form, students must have the recommendation of their undergraduate academic advisor, and the concurrence of the department chair and graduate coordinator in the Department of Civil Engineering. In order to remain in the program, students must maintain a GPA of at least 3.25. To continue in the program past the B.S.C.E. degree, students must apply for full admission into the Graduate School and the Civil Engineering M.S. program.

# **Department of Electrical and Computer Engineering**

The Department of Electrical and Computer Engineering offers Bachelors of Science degrees in Computer Engineering and Electrical Engineering. In addition, with an extra semester of study, students can receive a dual BS degree in Electrical and Computer Engineering.

The Department of Electrical and Computer Engineering offers a Master of Science degree for electrical or computer engineers who desire advanced study. The department also offers a concentration in Electrical or Computer Engineering for students pursuing the interdepartmental Doctor of Philosophy degree in Engineering.

Details about the program and the program objectives are available on the departmental home page (http://www.eece.memphis.edu/).

# **Computer Engineering**

The educational objectives of the Computer Engineering program are consistent with the mission of the University of Memphis. The program is designed to provide students with a satisfying, robust, and quality education in Computer Engineering, leading to professional employment and/or graduate level education.

The program educational objectives are that within a few years, graduates will have

secured employment in Computer Engineering or related fields;

- advanced their careers as measured by promotions, salaries, career satisfaction, positions of leadership, awards, recognitions, entrepreneurial activities, development of products or process, patents, and/or publications;
- continued to learn new knowledge and to acquire new expertise as measured by post-graduate education, continuing education, and/or professional registration;
- contributed to society and the profession as measured by professional service, community service, and/or public service.

In pursuit of these objectives, students enrolled in Computer Engineering are offered a curriculum designed to provide a thorough background and understanding of the theoretical and physical principles of computer hardware and software. The intent of the program is to produce graduates who can apply concepts and techniques of mathematics and physics to a variety of analysis and design applications in Computer Engineering. In addition, graduates are prepared to communicate their ideas succinctly and clearly in both oral and written presentations.

Graduates of Computer Engineering will have demonstrated:

- an ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics an ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as
  - well as global, cultural, social, environmental, and economic factors
- an ability to communicate effectively with a range of audiences
- an ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts
- an ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives
- an ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions an ability to acquire and apply new knowledge as needed, using appropriate learning strategies.

Laboratory facilities are available for a wide variety of instructional and research activities. Significant laboratory activity is required in the curriculum.

Career opportunities include positions in development and design, research, sales, management, manufacturing, and information systems. Some of the technical areas of opportunity are related to computer application, information systems and technology, mobile communications and devices, software development, and computer hardware design and development. An undergraduate student, with approval of the department chair, may select electives that satisfy the course entrance requirements for medical school.

**HONORS PROGRAM:** Students are eligible for the honors program in computer engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Computer Engineering requires a minimum of 8 hours of honors courses in Computer Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.CP.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Computer Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

1058

**GRADUATION:** The minimum requirements for the degree of Bachelor of Science in Computer Engineering are given below. The student must satisfy university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010, MATH 1910, MATH 1920, MATH 2120, a natural science elective, COMP 2150, COMP 2700, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121, or any equivalents to these courses used to satisfy degree requirements. No transfer credit with a grade less than a minimum grade of "C-" may be used to satisfy a requirement for the Bachelor of Science in Computer Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

# **Electrical Engineering**

The educational objectives of the Electrical Engineering program are consistent with the mission of the University of Memphis. The program is designed to provide students with a satisfying, robust, and quality education in Electrical Engineering, leading to professional employment and/or graduate level education.

The program educational objectives are that within a few years, graduates will have

secured employment in Electrical Engineering or related fields;

- advanced their careers as measured by promotions, salaries, career satisfaction, positions of leadership, awards, recognitions, entrepreneurial activities, development of products or process, patents, and/or publications;
- continued to learn new knowledge and to acquire new expertise as measured by post-graduate education, continuing education, and/or professional registration;
- contributed to society and the profession as measured by professional service, community service, and/or public service.

In pursuit of these objectives, students enrolled in Electrical Engineering are offered a curriculum designed to provide a thorough background and understanding of the theoretical and physical principles of electric and magnetic phenomena. The intent of the program is to produce graduates who can apply concepts and techniques of mathematics and physics to a variety of analysis and design applications in Electrical Engineering. In addition graduates are prepared to communicate their ideas succinctly and clearly in both oral and written presentations.

#### Graduates of Electrical Engineering will have demonstrated:

- an ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics an ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as
  - well as global, cultural, social, environmental, and economic factors
- an ability to communicate effectively with a range of audiences
- an ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts
- an ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives
- an ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions an ability to acquire and apply new knowledge as needed, using appropriate learning strategies.

Laboratory facilities are available for a wide variety of instructional and research activities. Significant laboratory activity is required in the curriculum.

Career opportunities include positions in development and design, research, sales, management, manufacturing, and construction. Some of the technical areas of opportunity are related to computer applications, communications systems, power generation and distribution systems, microwave and antenna systems, automatic control systems, and general instrumentation. An undergraduate student, with the approval of the department chair, may select some electives that satisfy the course entrance requirements for medical school.

**Honors Program:** Students are eligible for the honors program in Electrical Engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Electrical Engineering requires a minimum of 8 hours of honors courses in Electrical Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.E.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Electrical Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this

accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

**GRADUATION:** The minimum requirements for the degree of Bachelor of Science in Electrical Engineering are given below. The student must satisfy general university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010 ,MATH 1910, MATH 1920, MATH 2110, MATH 2120, a natural science elective, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121 ,COMP 1900, or any equivalents to these courses used to satisfy degree requirements. No transfer credit with a grade less than "C" may be used to satisfy a requirement for the Bachelor of Science in Electrical Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering or designee.

1059

#### Second Major in Mathematical Sciences

With minimal additional course work, Electrical and Computer Engineering majors are eligible for a Second Major in Mathematical Sciences. See the catalog for Mathematical Sciences.

## **Computer Engineering**, (**B.S.CP.E.**)

## Graduation

The minimum requirements for the degree of Bachelor of Science in Computer Engineering are given below. The student must satisfy university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010, MATH 1910, MATH 1920, MATH 2120, a Natural Science Elective, COMP 2150, COMP 2700, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121, or any equivalents to these courses used to satisfy degree requirements. No transfer credit with a grade less than a minimum grade of "C" may be used to satisfy a requirement for the Bachelor of Science in Computer Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering (or designee).

#### Second Major in Mathematical Sciences

With minimal additional course work, Electrical and Computer Engineering majors are eligible for a Second Major in Mathematical Sciences. See the catalog for Mathematical Sciences.

## Honors Program

Students are eligible for the honors program in Computer Engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Computer Engineering requires a minimum of 8 hours of honors courses in Computer Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.CP.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in Computer Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

### Minors:

Students satisfying the requirements for the Bachelor of Science in Computer Engineering may also satisfy requirements for a minor offered by a department in one of the other colleges. Requirements for a minor are specified by the appropriate college and department. Students should submit application for the minor to the appropriate department chair. Candidates for graduation who satisfy requirements for a minor should file the approved application with the intent-to-graduate cards.

## University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

### Communication

ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

### **Mathematics**

1060

MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

### Natural Science

```
PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)
```

## History

Waived for B.S.CP.E. students who have completed one unit of history in high school.

## College and Degree Requirements (21 hours)

## Mathematics (14 hours)

MATH 1920 - Calculus II\*\* **Credit Hours:** (4) MATH 2120 - Differential Equations\*\* **Credit Hours:** (3) MATH 3242 - Intro Linear Algebra **Credit Hours:** (3) COMP 2700 - Discrete Structures **Credit Hours:** (4)

## Natural Science (4 hours)

CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) or PHYS 1020 - Survey of Astronomy I Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) or ESCI 1040 - Physical Geology Credit Hours: (4)

## Collateral Course (3 hours)

ENGR 1010 - Engineering Problem Solving Credit Hours: (3)

## The Major (65 hours)

## Major Core (59 hours)

Completion of the following:

EECE 1208 - Intro EECE Lab Credit Hours: (1) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) EECE 2201 - Circuit Analysis I Credit Hours: (3) EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1) The online catalog can be accessed at: http://catalog.memphis.edu/index.php EECE 2207 - Engineering Math Applications Credit Hours: (3) EECE 2222 - Digital Circuit Design Credit Hours: (4) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 4270 - Operating Systems Credit Hours: (3) EECE 3201 - Circuit Analysis II Credit Hours: (4) EECE 3203 - Signals and Systems | Credit Hours: (3) EECE 3204 - Signals and Systems II Credit Hours: (3) EECE 3211 - Electronics | Credit Hours: (3) EECE 3213 - Electrical and Computer Engineering Lab 2 Credit Hours: (1) EECE 3270 - Intro to Microprocessor Credit Hours: (4) EECE 4081 - Software Engineering Credit Hours: (3) EECE 4235 - Probabilistic System Analysis Credit Hours: (3) EECE 4278 - Computer Organization Credit Hours: (3) EECE 4279 - Professional Development Credit Hours: (3) EECE 4280 - Electricl/Computer Engr Design Credit Hours: (3) EECE 4991 - Electrical/Computer Projects | Credit Hours: (3)

### Electives (6 hours)

Computer Engineering electives from:

EECE 4222 - Digital Logic/Computer Design Credit Hours: (3) EECE 4277 - DSP Microprocessors Credit Hours: (4) EECE 4710 - Computer Architecture Credit Hours: (3) EECE 4711 - Fault Tolerant Computer Des Credit Hours: (3) EECE 4712 - Embedded Systems Credit Hours: (3) EECE 4272 - Engineering Software Credit Hours: (3) EECE 4273 - Database Engineering Credit Hours: (3) EECE 4275 - Network Programming Credit Hours: (3) EECE 4276 - Adv Network Programming Credit Hours: (3) EECE 4720 - Intro Artificial Intelligence Credit Hours: (3) EECE 4731 - Data Visualization Credit Hours: (3) EECE 4741 - Intro to Neurocomputing Credit Hours: (3)

## Typical 4-Year Computer Engineering Sequence

### **Freshman Year**

#### Fall Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3)
MATH 1910 - Calculus I \*\* Credit Hours: (4)
EECE 1208 - Intro EECE Lab Credit Hours: (1)
ENGR 1010 - Engineering Problem Solving Credit Hours: (3)
Humanities/Fine Arts\* Credit Hours: (3)
Total Hours: 14

Spring Semester ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) Total Hours: 15

#### Academic Year Total 29 hrs

#### Sophomore Year

#### Fall Semester

EECE 2201 - Circuit Analysis I Credit Hours: (3) EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1) EECE 2207 - Engineering Math Applications Credit Hours: (3) COMP 2150 - CS2: OOP and Data Structures Credit Hours: (4) COMP 2700 - Discrete Structures Credit Hours: (4) Total Hours: 15 Spring Semester

EECE 2222 - Digital Circuit Design Credit Hours: (4) EECE 3201 - Circuit Analysis II Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) Total Hours: 15

#### Academic Year Total 30 hrs

#### Junior Year

#### Fall Semester

EECE 3211 - Electronics | Credit Hours: (3) EECE 3213 - Electrical and Computer Engineering Lab 2 Credit Hours: (1) EECE 3203 - Signals and Systems | Credit Hours: (3)

Natural Science Elective Credit Hours: (4)

CHEM 1110 - General Chemistry | Credit Hours: (3)

CHEM 1111 - General Chemistry | Lab Credit Hours: (1)

or PHYS 1020 - Survey of Astronomy | Credit Hours: (3)

PHYS 1002 - Astronomy Laboratory Credit Hours: (1)

Or

ESCI 1040 - Physical Geology Credit Hours: (4)

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3)

ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3)

MATH 3242 - Intro Linear Algebra Credit Hours: (3) Total Hours: 17

#### Spring Semester

EECE 3204 - Signals and Systems II Credit Hours: (3) EECE 3270 - Intro to Microprocessor Credit Hours: (4) EECE 4235 - Probabilistic System Analysis Credit Hours: (3) EECE 4991 - Electrical/Computer Projects I Credit Hours: (3) ENGL 3603 - Engineering Communications Credit Hours: (3) Total Hours: 16

Academic Year Total 33 hrs

### Senior Year

#### Fall Semester

EECE 4278 - Computer Organization Credit Hours: (3) Computer Engineering Elective Credit Hours: (3) ECON 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php EECE 4081 - Software Engineering Credit Hours: (3)
 EECE 4279 - Professional Development Credit Hours: (3)
 Total Hours: 15

#### **Spring Semester**

EECE 4280 - Electricl/Computer Engr Design Credit Hours: (3) COMP 4270 - Operating Systems Credit Hours: (3) Computer Engineering Elective Credit Hours: (3) Humanities/Fine Arts\* Credit Hours: (3) Social/Behavioral Sciences\* Credit Hours: (3) Total Hours: 15

#### Academic Year Total 30 hrs

## Total Hours Required for Graduation: 122

\*Must satisfy University General Education Program Requirement.

## Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Electrical or Computer Engineering during their senior year. Students are encouraged to begin planning to enter the Accelerated BS/MS program early in their undergraduate career, in consultation with their advisor in the Department of Electrical and Computer Engineering. Working with the undergraduate and graduate academic coordinators, undergraduates, who are selected into this program, may register for and substitute graduate level courses for undergraduate EECE electives or take and substitute cross-listed graduate versions of required undergraduate courses. This will allow the student to complete their BS degree while also beginning the coursework necessary to meet their MS degree requirement. However, any graduate coursework will not apply to the undergraduate GPA.

Students may apply for the program once they have completed one semester of junior course work. In order to remain in the program past the junior year, students must maintain a GPA of at least 3.25. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To continue in the program past the BS, students must apply for full admission into the Graduate School and either the Electrical or Computer Engineering MS program during their senior year. Students that are eligible for the ABM program will have the GRE requirement waived.

## **Electrical Engineering, (B.S.E.E.)**

### Graduation

The minimum requirements for the degree of Bachelor of Science in Electrical Engineering are given below. The student must satisfy general university and college requirements. The student must obtain a minimum grade of "C-" in all EECE courses and in ENGR 1010, MATH 1910, MATH 1920, MATH 2110, MATH 2120, a Natural Science Elective, PHYS 2110/PHYS 2111, PHYS 2120/PHYS 2121, COMP 1900, or any equivalents to these courses used to satisfy degree requirements. No transfer credit with a grade less than "C-" may be used to satisfy a requirement for the Bachelor of Science in Electrical Engineering. Waiver of departmental graduation requirements for exceptional circumstances will be granted only upon approval of both the department chair and the Dean of the College of Engineering or designee.

#### Second Major in Mathematical Sciences

With minimal additional course work, Electrical and Computer Engineering majors are eligible for a Second Major in Mathematical Sciences. See the catalog for Mathematical Sciences.

## Honors Program

Students are eligible for the honors program in Electrical Engineering if they have and maintain a cumulative GPA of 3.4 with at least junior standing and have received approval of the departmental honors committee. The honors program in Electrical Engineering requires a minimum of 8 hours of honors courses in Electrical Engineering and must include the completion of an honors thesis (EECE 4999). Those students who complete the program and the regular B.S.E.E. requirements will be recognized at the commencement ceremony by having their degree conferred "With Honors in

Electrical Engineering." Moreover, the student's diploma and record at the University of Memphis will reflect this accomplishment. Details concerning this program and honors course offerings are available in the Department of Electrical and Computer Engineering.

1064

### Minors:

Students satisfying the requirements for the Bachelor of Science in Electrical Engineering may also satisfy requirements for a minor offered by a department in one of the other colleges. Requirements for minors are specified by the appropriate college and department. Students should submit application for the minor to the appropriate department chair. Candidates for graduation who satisfy requirements for a minor should file the approved application with the intent-to-graduate cards.

## University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

### Communication

ENGL 3603 - Engineering Communications Credit Hours: (3) instead of COMM 2381.

#### Mathematics

MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling in MATH 1910)

### Social/Behavioral Sciences

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

### **Natural Science**

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3)
PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1)
PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3)
PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

### History

Waived for B.S.E.E. students who have completed one unit of American history in high school.

### College and Degree Requirements (21 hours)

### Mathematics (14 hours)

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3)

### Natural Science (4 hours)

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) or PHYS 1020 - Survey of Astronomy | Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) or ESCI 1040 - Physical Geology Credit Hours: (4)

#### Collateral Course (3 hours)

ENGR 1010 - Engineering Problem Solving Credit Hours: (3)

### The Major (65 hours)

#### Major Core (53 hours)

Completion of 53 hours including:

EECE 1208 - Intro EECE Lab Credit Hours: (1) EECE 1207 - Electrical Engr Computations Credit Hours: (3) COMP 1900 - CS1: Intro Comp Science Credit Hours: (4) EECE 2201 - Circuit Analysis | Credit Hours: (3) EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1) EECE 2207 - Engineering Math Applications Credit Hours: (3) EECE 2222 - Digital Circuit Design Credit Hours: (4) EECE 3201 - Circuit Analysis II Credit Hours: (4) EECE 3213 - Electrical and Computer Engineering Lab 2 Credit Hours: (1) EECE 3203 - Signals and Systems | Credit Hours: (3) EECE 3204 - Signals and Systems II Credit Hours: (3) EECE 3211 - Electronics | Credit Hours: (3) EECE 3240 - Electromagnetic Field Theory Credit Hours: (3) or EECE 4213 - Antenna Theory/Design Credit Hours: (3) or EECE 4215 - Applied Electromagnetic Fields Credit Hours: (3) EECE 3270 - Intro to Microprocessor Credit Hours: (4) EECE 4991 - Electrical/Computer Projects | Credit Hours: (3) EECE 4201 - Energy Conversion Credit Hours: (4) EECE 4235 - Probabilistic System Analysis Credit Hours: (3) EECE 4279 - Professional Development Credit Hours: (3) EECE 4280 - Electricl/Computer Engr Design Credit Hours: (3)

### Electives (12 hours)

Three (3) hours of Electrical Engineering electives must be chosen from the list below. The other 6 hours are chosen from upper division EECE courses.

#### Electrical Engineering Electives (3 hours)

3 hours of Electrical Engineering electives must be chosen from:

EECE 3212 - Electronics II Credit Hours: (4) EECE 4230 - Data Communication System Credit Hours: (3) EECE 4231 - Communication Theory Credit Hours: (3) EECE 4251 - Control System Engr Credit Hours: (3) EECE 4252 - Digital Control Systems Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php EECE 4202 - Electrical Power Systems **Credit Hours:** (3) EECE 4204 - Power Distribution System **Credit Hours:** (3) EECE 4205 - Modern Grid with Renewables **Credit Hours:** (3) EECE 4206 - Electrical Power Quality **Credit Hours:** (3)

### Technical Electives (3 hours)

These electives may be chosen from upper-division courses in engineering, mathematics, physics, or computer science. Approval of department chair or designee is required for all technical electives.

### Concentrations

Students may use elective hours to broaden their base of knowledge or for one of the concentrations below. A minimum of 9 semester hours is required for a concentration. EECE electives and technical may be used to complete a concentration.

#### **Computer Engineering**

- EECE 4081 Software Engineering Credit Hours: (3)
- EECE 4222 Digital Logic/Computer Design Credit Hours: (3)

EECE 4272 - Engineering Software Credit Hours: (3)

- EECE 4273 Database Engineering Credit Hours: (3)
- EECE 4275 Network Programming Credit Hours: (3)
- EECE 4276 Adv Network Programming Credit Hours: (3)
- EECE 4277 DSP Microprocessors Credit Hours: (4)
- EECE 4278 Computer Organization Credit Hours: (3)
- EECE 4710 Computer Architecture Credit Hours: (3)
- EECE 4711 Fault Tolerant Computer Des Credit Hours: (3)
- EECE 4712 Embedded Systems Credit Hours: (3)
- EECE 4720 Intro Artificial Intelligence Credit Hours: (3)
- EECE 4730 Expert Systems Credit Hours: (3)
- EECE 4731 Data Visualization Credit Hours: (3)

#### Electrophysics

EECE 4241 - Solid State Physcl Electronics Credit Hours: (3) EECE 4242 - Electro-Optics Credit Hours: (3) EECE 4243 - Linear Optical Systems Credit Hours: (3)

#### Systems and Signals

- EECE 4202 Electrical Power Systems Credit Hours: (3) EECE 4204 - Power Distribution System Credit Hours: (3) EECE 4221 - Electronics III Credit Hours: (4) EECE 4232 - Discrete Signal Process Credit Hours: (3)
- EECE 4251 Control System Engr Credit Hours: (3)
- EECE 4252 Digital Control Systems Credit Hours: (3)
- EECE 4253 Control Systems Lab Credit Hours: (1)

#### Intelligent Systems Engineering

The new concentration requires a student to take any three (3) of the following six (6) EECE courses:

EECE 4251 - Control System Engr Credit Hours: (3) EECE 4712 - Embedded Systems Credit Hours: (3) EECE 4720 - Intro Artificial Intelligence Credit Hours: (3) EECE 4730 - Expert Systems Credit Hours: (3) EECE 4731 - Data Visualization Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### **Additional Note**

With approval, Project II, EECE 4992 can be taken for 3 semester hours credit in any of the areas of concentration.

## Typical 4-Year Electrical Engineering Sequence

### Freshman Year

#### Fall Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) EECE 1208 - Intro EECE Lab Credit Hours: (1) ENGR 1010 - Engineering Problem Solving Credit Hours: (3) Humanities/Fine Arts\* Credit Hours: (3) Total Hours: 14

#### Spring Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1920 - Calculus II\*\* Credit Hours: (4) COMP 1900 - CS1:Intro Comp Science Credit Hours: (4) PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) Total Hours: 15

#### Academic Year Total 29 hrs

#### Sophomore Year

#### Fall Semester

EECE 2201 - Circuit Analysis I Credit Hours: (3)
EECE 2203 - Electrical and Computer Engineering Lab 1 Credit Hours: (1)
EECE 2207 - Engineering Math Applications Credit Hours: (3)
EECE 2222 - Digital Circuit Design Credit Hours: (4)
MATH 2110 - Calculus III\*\* Credit Hours: (4)
Total Hours: 15

#### Spring Semester

EECE 3201 - Circuit Analysis II Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) Total Hours: 14

#### Academic Year Total 29 hrs

#### Junior Year

 Fall Semester

 EECE 3211 - Electronics I Credit Hours: (3)

 EECE 3213 - Electrical and Computer Engineering Lab 2 Credit Hours: (1)

EECE 3203 - Signals and Systems | Credit Hours: (3) MATH 3242 - Intro Linear Algebra Credit Hours: (3) ENGL 3603 - Engineering Communications Credit Hours: (3) Natural Science Elective Credit Hours: (4) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) PHYS 1020 - Survey of Astronomy | Credit Hours: (3) PHYS 1002 - Astronomy Laboratory Credit Hours: (1) ESCI 1040 - Physical Geology Credit Hours: (4) **Total Hours: 17** Spring Semester EECE 3204 - Signals and Systems II Credit Hours: (3) EECE 3270 - Intro to Microprocessor Credit Hours: (4) EECE 3240 - Electromagnetic Field Theory Credit Hours: (3) or EECE 4213 - Antenna Theory/Design Credit Hours: (3) or EECE 4215 - Applied Electromagnetic Fields Credit Hours: (3) EECE 4235 - Probabilistic System Analysis Credit Hours: (3) EECE 4991 - Electrical/Computer Projects | Credit Hours: (3) **Total Hours: 16** 

Academic Year Total 33 hrs

### Senior Year

#### Fall Semester

EECE 4201 - Energy Conversion Credit Hours: (4)
Electrical Engineering Depth Elective Credit Hours: (3)
EECE Elective Credit Hours: (3)
EECE 4279 - Professional Development Credit Hours: (3)
Humanities/Fine Arts\* Credit Hours: (3)
Total Hours: 16

#### Spring Semester

EECE 4280 - Electricl/Computer Engr Design Credit Hours: (3) EECE Elective Credit Hours: (3) ECON 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Social/Behavioral Sciences\* Credit Hours: (3) Technical Elective Credit Hours: (3) Total Hours: 15

### Academic Year Total 31 hrs

## Total Hours Required for Graduation: 122

\*Must satisfy University General Education Program Requirement

## Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Electrical or Computer Engineering during their senior year. Students are encouraged to begin planning to enter the Accelerated BS/MS program early in their undergraduate career, in

consultation with their advisor in the Department of Electrical and Computer Engineering. Working with the undergraduate and graduate academic coordinators, undergraduates, who are selected into this program, may register for and substitute graduate level courses for undergraduate EECE electives or take and substitute cross-listed graduate versions of required undergraduate courses. This will allow the student to complete their BS degree while also beginning the coursework necessary to meet their MS degree requirements. However, any graduate coursework will not apply to the undergraduate GPA.

1069

Students may apply for the program once they have completed one semester of junior course work. In order to remain in the program past the junior year, students must maintain a GPA of at least 3.25. Up to 12 hours of graduate course work may be applied to both the undergraduate and graduate programs. To continue in the program past the BS, students must apply for full admission into the Graduate School and the Electrical and Computer Engineering MS program during their senior year. Students that are eligible for the ABM program will have the GRE requirement waived.

# **Department of Engineering Technology**

Engineering Technology is the profession in which knowledge of mathematics and natural science, gained by higher education, experience, and practice, is devoted primarily to the implementation and extension of existing technology for the benefit of humanity. Engineering Technology education focuses primarily on the applied aspects of science and that portion of the technological spectrum closest to product improvement, industrial practices, and engineering operation functions.

The Program Educational Objectives (PEO) of the Engineering Technology program are to produce graduates who, within five years of graduation, are prepared with the depth of knowledge, breadth of experiences, and an attitude of professionalism that will enable them to:

Attain gainful employment in a related technical field providing personal and professional growth;

Pursue professional development such as additional formal education, certifications and workshops;

Attain increasing levels of responsibility and leadership in their own chosen field;

Apply a depth of knowledge and ability to manage, design, develop, analyze, and/or implement technical projects, demonstrating a quality of performance necessary to succeed in engineering technology careers.

Graduates of Engineering Technology will have demonstrated:

- An ability to apply knowledge, techniques, skills and modern tools of mathematics, science, engineering, and technology to solve broadlydefined engineering problems appropriate to the discipline;
- An ability to design systems, components, or processes meeting specified needs for broadly-defined engineering problems appropriate to the discipline;
- An ability to apply written, oral, and graphical communication in broadly-defined technical and non-technical environments; and an ability to identify and use appropriate technical literature;
- An ability to conduct standard tests, measurements, and experiments and to analyze and interpret the results to improve processes;

An ability to function effectively as a member, as well as a leader, on technical teams.

Graduates are referred to as Engineering Technologists and work as members of the engineering team focusing primarily on the implementation of new technologies. Students will select two fields of study providing depth in subjects of interest to them. Technical electives will provide breadth of study that supports their general knowledge base. Within the core are courses that prepare students to manage people and projects as they grow in their career. Graduates of this program are employed in the areas of quality assurance, product/software support, applied design and development, manufacturing support. plant management, computerized process control, systems planning, process planning, supervision and technical sales.

**GRADUATION:** To qualify for the degree of Bachelor of Science in Engineering Technology, the student must satisfy University and College requirements, and obtain a 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering technology and mathematics courses used to satisfy degree requirements.

# **Engineering Technology, (B.S.E.T.)**

## Graduation

To qualify for the degree of Bachelor of Science in Engineering Technology, the student must satisfy University and College requirements, and obtain a 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering technology and mathematics courses used to satisfy degree requirements.

## University General Education Program (42 hours)

1070 See Graduation from the University link for University General Education Program requirements. Note the following are specified by the department for this program:

### Mathematics

MATH 1910 - Calculus | \*\* Credit Hours: (4)

### **Natural Science**

PHYS 2010 - General Physics | Credit Hours: (3) PHYS 2011 - General Physics Lab | Credit Hours: (1) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1)

## College and Degree Requirements (7 or 8 hours)

```
CHEM 1010 - Chemistry of Materials** Credit Hours: (3)
CHEM 1011 - Chemistry of Materials Lab ** Credit Hours: (1)
MATH 1730 - Pre-Calculus** Credit Hours: (4)
or
ENGR 1009 - Prep Math for Engineering Credit Hours: (3)
```

## The Major (74-77 hours)

### **Engineering Technology Core**

TECH 1010 - Computer Applications in Tech Credit Hours: (3) TECH 1211 - Computer Programming Credit Hours: (3) TECH 1411 - Introduction to Technology Credit Hours: (2) TECH 1521 - Graphics/Descriptive Geometry Credit Hours: (3) TECH 1711 - Manufacturing Process | Credit Hours: (3) TECH 1811 - Electronic Circuit Technology Credit Hours: (3) TECH 2821 - Solid State Technology Credit Hours: (3) TECH 2822 - Circuit Analysis Credit Hours: (4) TECH 2908 - Applications of Technology Credit Hours: (2) TECH 3044 - Analysis for Engineering Tech Credit Hours: (4) TECH 3440 - Project Plan/Cost Evaluation Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) TECH 4401 - Science/Technology/Society Credit Hours: (2) TECH 4462 - Quality Improvement Credit Hours: (3) TECH 4943 - Senior Project Plan Seminar Credit Hours: (1) TECH 4945 - Senior Project Credit Hours: (2)

## Engineering Technology Electives

Completion of 30-32 hours of technical electives that include a minimum of two (2) of the following fields of study selected in consultation with an academic advisor:

### Automation & Control Systems

TECH 2831 - Advanced Solid State Tech Credit Hours: (3)

TECH 3821 - Industrial Electronics Credit Hours: (3)

TECH 3822 - Programmable Logic Control Credit Hours: (4)

TECH 4474 - Automation and Robotics Credit Hours: (3)

TECH 3841 - Electrical Power/Motor Control Credit Hours: (3)

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### Mechanical Systems Design

TECH 3401 - Strength of Materials **Credit Hours:** (3) TECH 3421 - Manufacturing Process II **Credit Hours:** (4) TECH 3573 - Dynamics/Design/Automation **Credit Hours:** (3) TECH 4472 - Computer Aided Design **Credit Hours:** (3) TECH 4571 - Tool Design **Credit Hours:** (3)

#### **Microprocessor Systems**

TECH 2831 - Advanced Solid State Tech Credit Hours: (3) TECH 3232 - Digital Technology Credit Hours: (4) TECH 3233 - Microproc & Interfacing Credit Hours: (4) TECH 4234 - Microprocessors & IOT Credit Hours: (4)

#### **Operations Strategy & Lean Principles**

TECH 4460 - Work Design/Improvement Credit Hours: (3) TECH 4464 - Production Control Systems Credit Hours: (3) TECH 4466 - Facility Design Credit Hours: (3)

#### **Product Realization**

TECH 3401 - Strength of Materials **Credit Hours:** (3) TECH 3421 - Manufacturing Process II **Credit Hours:** (4) TECH 4472 - Computer Aided Design **Credit Hours:** (3) TECH 4474 - Automation and Robotics **Credit Hours:** (3) TECH 4476 - Computer Aided Manufacturing **Credit Hours:** (3)

#### Software Design

TECH 2251 - Adv Programming Technology Credit Hours: (3) TECH 2261 - Data Structures Credit Hours: (3) TECH 4262 - Modern Programming Credit Hours: (3) TECH 4263 - Server Application Technology Credit Hours: (4)

#### System/Network Administration

TECH 3232 - Digital Technology Credit Hours: (4) TECH 3241 - Internet Technology Credit Hours: (3) TECH 4281 - Computer Network Technology Credit Hours: (4) TECH 4272 - Operating Systems Credit Hours: (4)

### Note

The core requirements satisfy prerequisites for these fields of study. Observe prerequisites when enrolling in courses within a particular field of study. NOTE: Substitutions must be approved by the Undergraduate Program Coordinator.

## Typical 4-Year Engineering Technology Sequence

### **Freshman Year**

#### Fall Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) MATH 1730 - Pre-Calculus\*\* Credit Hours: (4) or ENGR 1009 - Prep Math for Engineering Credit Hours: (3) TECH 1411 - Introduction to Technology Credit Hours: (2) TECH 1711 - Manufacturing Process I Credit Hours: (3) TECH 1010 - Computer Applications in Tech Credit Hours: (3) Total Hours: 14-15 Spring Semester ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MATH 1910 - Calculus I \*\* Credit Hours: (4) TECH 1211 - Computer Programming Credit Hours: (3)

TECH 1521 - Graphics/Descriptive Geometry Credit Hours: (3)

TECH 1811 - Electronic Circuit Technology Credit Hours: (3) Total Hours: 16

Semester Totals 30-31 hrs

#### Sophomore Year

#### Fall Semester

TECH 2908 - Applications of Technology Credit Hours: (2)
PHYS 2010 - General Physics | Credit Hours: (3)
PHYS 2011 - General Physics Lab | Credit Hours: (1)
History Credit Hours: (3)\*
TECH 2821 - Solid State Technology Credit Hours: (3)
TECH 2822 - Circuit Analysis Credit Hours: (4)
Total Hours: 16

#### Spring Semester

COMM 2381 - Oral Communication \*\* Credit Hours: (3) PHYS 2020 - General Physics II Credit Hours: (3) PHYS 2021 - General Physics Lab II Credit Hours: (1) CHEM 1010 - Chemistry of Materials\*\* Credit Hours: (3) CHEM 1011 - Chemistry of Materials Lab \*\* Credit Hours: (1) TECH 3044 - Analysis for Engineering Tech Credit Hours: (4) Total Hours: 15

#### Semester Totals 31 hrs

#### Junior Year

#### **Fall Semester**

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) TECH 3440 - Project Plan/Cost Evaluation Credit Hours: (3) TECH 4381 - Principles of Supervision\*\* Credit Hours: (3) Humanities Credit Hours: (3)\* Technical Elective Credit Hours: (3) Total Hours: 15

#### Spring Semester

TECH 4401 - Science/Technology/Society Credit Hours: (2) TECH 4462 - Quality Improvement Credit Hours: (3) History **Credit Hours:** (3)\* Social/Behavioral Sciences **Credit Hours:** (3)\* Technical Elective **Credit Hours:** (3) Technical Elective **Credit Hours:** (3) **Total Hours:** 17

#### Semester Totals 32 hrs

#### Senior Year

#### Fall Semester

TECH 4943 - Senior Project Plan Seminar Credit Hours: (1) Social/Behavioral Sciences Credit Hours: (3) Technical Elective Credit Hours: (3-4) Technical Elective Credit Hours: (3) Technical Elective Credit Hours: (3) Technical Elective Credit Hours: (3) Total Hours: 16-17

#### Spring Semester

TECH 4945 - Senior Project Credit Hours: (2) Humanities Credit Hours: (3)\* Technical Elective Credit Hours: (3-4) Technical Elective Credit Hours: (3) Technical Elective Credit Hours: (3) Total Hours: 14-15

#### Semester Totals 30-32 hrs

## Total Hours Required for Graduation: 123-125

\*Must satisfy University General Education Program Requirements

## Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in Engineering Technology during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.0 grade point average. Each applicant will complete an interview with the graduate academic coordinator for Engineering Technology.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

Only in ABM programs, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# **Engineering Technology Minor**

## Requirements

A student must complete 18 hours of Engineering Technology coursework (observing prerequisites), 12 of which must be upper-division, selected in consultation with a departmental advisor. It is understood that some prerequisites may be satisfied by coursework from other departments and programs.

1074

# **Department of Mechanical Engineering**

Mechanical Engineering is a broad field that contains many areas. Students are offered a wide variety of topics that touch on as many of these areas as possible in a balanced four-year program. The curriculum is designed to prepare graduates for professional practice, and to provide a foundation for lifelong learning as well as professional growth.

The course of study begins with a strong foundation in mathematics, physical sciences, and engineering sciences, and culminates in a series of synthesis and design courses. These require the student to apply material learned in foundation courses to practical design problems in various areas. Traditional classroom instruction is supplemented with laboratory experiences in four areas. The laboratory courses are designed to develop the student's knowledge base with a hands-on learning experience.

The program educational objectives express expectations of the program graduates' abilities within the first few years after successfully completing this comprehensive curriculum:

Graduates are employed as mechanical engineers or in other professional fields that would benefit from a Mechnical Engineering education, Graduates pursue advanced studies or engage in life-long learning activities.

Graduates of Mechanical Engineering will have demonstrated:

an ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics an ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as

well as global, cultural, social, environmental, and economic factors

an ability to communicate effectively with a range of audiences

an ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts

an ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives

an ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions an ability to acquire and apply new knowledge as needed, using appropriate learning strategies.

The diversity encountered in the profession requires the successful Mechanical Engineer to have technical and non-technical skills. Courses in the humanities and social sciences enhance non-technical skills, and explore the engineer's relationship with, and responsibility to, society. Students learn that as professionals, they identify with other engineers, and that the welfare of the public is of prime concern. These non-technical courses allow the student to interact and communicate effectively with a wide variety of individuals.

**Graduation:** To earn a Bachelor of Science in Mechanical Engineering degree, the student must satisfy University and College requirements, and obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, physics, and chemistry courses used to satisfy degree requirements.

Honors Program: The Honors in Mechanical Engineering Program provides an exceptional educational opportunity for highly motivated students to develop their talents, interests, and abilities within a curriculum designed to encourage independence and creativity.

<u>Admission to the Honors Program:</u> Incoming freshmen who score a minimum of 26 on the ACT, or its equivalent, are invited to participate. Transfer students or students previously enrolled at the University of Memphis are eligible for the program if they have an overall grade point average of 3.00, and a grade point average of 3.25 for course work within the Herff College of Engineering. The departmental honors committee admits eligible students to the program upon approval of the Application for Admission to the Mechanical Engineering Honors Program. Students with academic records that fall short of these requirements may apply for provisional acceptance.

<u>Retention in the Honors Program:</u> Participants must maintain a minimum overall grade point average of 3.00 and a minimum grade point average of 3.25 for course work within the college to continue in the program. The departmental honors committee may grant participants failing to meet this requirement a one semester probationary period before they are dismissed from the program.

Requirements:

- To qualify for the designation "With Honors in Mechanical Engineering", a student must successfully complete a minimum of 18 semester hours from the following: MECH 4395, MECH 4396, and 12 hours of mechanical engineering honors courses.
- To qualify for the designations "With Honors in Mechanical Engineering" and "University Honors with Thesis", a student must successfully complete a minimum of 25 semester hours from the following: MECH 4395 and MECH 4396, 9 hours of mechanical engineering honors

courses, one hours fo UNHP 1100, and 9 hours of general education honors courses. To enroll in mechanical engineering honors sections, a student must request departmental approval. A minimum grade of "B" (3.0)is required in each honors course for it to count toward fulfilling the honors course requirement. Regular credit for the course will be earned if the grade is lower than a "B". A participant must select a major advisor by the beginning of the second semester junior year and enroll in MECH 4395 - Honors Thesis Proposal. Successful completion of this course requires acceptance of a thesis proposal by the departmental honors committee. During the second semester of the senior year, a participant must enroll in MECH 4396 - Honors Thesis. Successful completion of this course requires acceptance of a thesis by the departmental honors committee.

**Designation of "With Honors in Mechanical Engineering":** Students who successfully complete the prescribed course work will have earned the designation of "With Honors in Mechanical Engineering." This designation will be recognized at the commencement ceremony and it will appear on the transcript and diploma.

# Mechanical Engineering, (B.S.M.E.)

## Graduation

To earn a Bachelor of Science in Mechanical Engineering degree, the student must satisfy University and College requirements, and obtain a minimum 2.0 grade point average on all work completed, and obtain a minimum grade of "C-" in all engineering, mathematics, and natural science courses used to satisfy degree requirements.

## Honors Program

The Honors in Mechanical Engineering Program provides an exceptional educational opportunity for highly motivated students to develop their talents, interests, and abilities within a curriculum designed to encourage independence and creativity.

Admission to the Honors Program: Incoming freshmen who score a minimum of 26 on the ACT, or its equivalent, are invited to participate. Transfer students or students previously enrolled at the University of Memphis are eligible for the program if they have an overall grade point average of 3.00, and a grade point average of 3.25 for course work within the Herff College of Engineering. The departmental honors committee admits eligible students to the program upon approval of the Application for Admission to the Mechanical Engineering Honors Program. Students with academic records that fall short of these requirements may apply for provisional acceptance.

<u>Retention in the Honors Program</u>: Participants must maintain a minimum overall grade point average of 3.00 and a minimum grade point average of 3.25 for course work within the college to continue in the program. The departmental honors committee may grant participants failing to meet this requirement a one semester probationary period before they are dismissed from the program.

#### Requirements:

- To qualify for the designation "With Honors in Mechanical Engineering", a student must successfully complete a minimum of 18 semester hours from the following: MECH 4395, MECH 4396, and 12 hours of mechanical engineering honors courses.
- To qualify for the designations "With Honors in Mechanical Engineering" and "University Honors with Thesis", a student must successfully complete a minimum of 25 semester hours from the following: MECH 4395 and MECH 4396, 9 hours of mechanical engineering honors courses, one hours fo UNHP 1100, and 9 hours of general education honors courses. To enroll in mechanical engineering honors sections, a student must request departmental approval. A minimum grade of "B" (3.0) is required in each honors course for it to count toward fulfilling the honors course requirement. Regular credit for the course will be earned if the grade is lower than a "B". A participant must select a major advisor by the beginning of the second semester junior year and enroll in MECH 4395 Honors Thesis Proposal. Successful completion of this course requires acceptance of a thesis proposal by the departmental honors course requires acceptance of a thesis by the departmental honors course requires acceptance of a thesis. Successful completion of this course requires acceptance of a thesis by the departmental honors course requires acceptance of a thesis.

**Designation of "With Honors in Mechanical Engineering"**: Students who successfully complete the prescribed course work will have earned the designation of "With Honors in Mechanical Engineering." This designation will be recognized at the commencement ceremony and it will appear on the transcript and diploma.

## University General Education Program (36 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

## Communication

#### Mathematics

MATH 1910 - Calculus I \*\* Credit Hours: (4) (students who have not had MATH 1730 or its equivalent must take it before enrolling MATH 1910).

### Social/Behavioral Sciences

ECON (TNe) 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) must be taken in addition to 3 hours from the other specified choices.

#### Natural Science

PHYS 2110 - Physics for Scientists and Engineers I Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab I Credit Hours: (1) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1)

#### History

Waived for B.S.M.E. students who have completed one unit of American history in high school.

### College and Degree Requirements (28 hours)

#### Mathematics (11 hours)

MATH 1920 - Calculus II\*\* Credit Hours: (4) MATH 2110 - Calculus III\*\* Credit Hours: (4) MATH 2120 - Differential Equations\*\* Credit Hours: (3)

#### Natural Science (8 hours)

CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1)

#### One of the Following:

CHEM 1120 - General Chemistry II Credit Hours: (3) and CHEM 1121 - General Chemistry II Lab Credit Hours: (1) BIOL 1110 - General Biology I Credit Hours: (3) and BIOL 1111 - General Biology I Lab Credit Hours: (1) ESCI 1020 - Landforms \*\* Credit Hours: (4) ESCI 1040 - Physical Geology Credit Hours: (4) ESCI 1050 - The Earth Through Time Credit Hours: (4)

Collateral Courses (9 hours)

CIVL 2131 - Statics Credit Hours: (3) ENGR 1010 - Engineering Problem Solving Credit Hours: (3)

One of the Following:

EECE 2201 - Circuit Analysis I Credit Hours: (3) or EECE 2283 - Electrical Engr/Instrumntation Credit Hours: (3)

## The Major (64 hours)

### Completion of

MECH 1310 - Intro/Mechanical Engineering Credit Hours: (2) MECH 1312 - Mech Engr Computing | Credit Hours: (2) MECH 1314 - Mech Engr Computing II Credit Hours: (2) MECH 2318 - Engr Design Communication Credit Hours: (3) MECH 2320 - Mechanics of Materials Credit Hours: (3) MECH 2332 - Dynamics Credit Hours: (3) MECH 2311 - Engineering Thermodynamics | Credit Hours: (3) MECH 3312 - Engineering Thermodynamics II Credit Hours: (3) MECH 3320 - Engineering Materials Credit Hours: (3) MECH 3321 - Mechanics of Machines Credit Hours: (3) MECH 3323 - Machine Design Credit Hours: (3) MECH 3325 - Materials Laboratory Credit Hours: (1) MECH 3331 - Fluid Mechanics Credit Hours: (3) MECH 3335 - Fluid Mechanics Lab Credit Hours: (1) MECH 3341 - Numerical/Statistical Methods Credit Hours: (3) MECH 3351 - Heat Transfer | Credit Hours: (3) MECH 4355 - Thermo/Heat Transfer Lab Credit Hours: (1) MECH 4300 - Prep/Professional Practice Credit Hours: (1) MECH 4314 - Senior Design | Credit Hours: (3) MECH 4319 - Engineering Econ/Project Mgmt Credit Hours: (2) MECH 4322 - System Dynamics Credit Hours: (3) MECH 4323 - Senior Design II Credit Hours: (3) MECH 4335 - System Dynamics Lab Credit Hours: (1)

## Electives (9 hours)

Nine (9) hours of electives approved by the student's academic advisor.

## Typical 4-Year Mechanical Engineering Sequence

### Freshman Year

#### Fall Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) ENGR 1010 - Engineering Problem Solving Credit Hours: (3) CHEM 1110 - General Chemistry | Credit Hours: (3) CHEM 1111 - General Chemistry | Lab Credit Hours: (1) MATH 1910 - Calculus | \*\* Credit Hours: (4) MECH 1310 - Intro/Mechanical Engineering Credit Hours: (2) Total Hours: 16

#### **Spring Semester**

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) MECH 1312 - Mech Engr Computing | Credit Hours: (2) MATH 1920 - Calculus II\*\* Credit Hours: (4) MECH 1314 - Mech Engr Computing || Credit Hours: (2) PHYS 2110 - Physics for Scientists and Engineers | Credit Hours: (3) PHYS 2111 - Sci/Engr Phys Lab | Credit Hours: (1)

#### Semester Totals 31 hrs

#### Sophomore Year

#### Fall Semester

MATH 2110 - Calculus III\*\* Credit Hours: (4) PHYS 2120 - Physics For Scientists and Engineers II Credit Hours: (3) PHYS 2121 - Sci/Engr Phys Lab II Credit Hours: (1) CIVL 2131 - Statics Credit Hours: (3) MECH 2318 - Engr Design Communication Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) Total Hours: 17 Spring Semester MATH 2120 - Differential Equations\*\* Credit Hours: (3) MECH 2311 - Engineering Thermodynamics I Credit Hours: (3) MECH 2320 - Mechanics of Materials Credit Hours: (3)

MECH 2332 - Dynamics Credit Hours: (3)

EECE 2201 - Circuit Analysis | Credit Hours: (3)

**Total Hours: 15** 

Semester Totals 32 hrs

#### Junior Year

## Fall Semester

Social Science **Credit Hours:** (3) MECH 3312 - Engineering Thermodynamics II **Credit Hours:** (3) MECH 3320 - Engineering Materials **Credit Hours:** (3) MECH 3321 - Mechanics of Machines **Credit Hours:** (3) MECH 3325 - Materials Laboratory **Credit Hours:** (1) MECH 3331 - Fluid Mechanics **Credit Hours:** (3) **Total Hours:** 16

#### Spring Semester

ENGL 3603 - Engineering Communications Credit Hours: (3) MECH 3323 - Machine Design Credit Hours: (3) MECH 3335 - Fluid Mechanics Lab Credit Hours: (1) MECH 3341 - Numerical/Statistical Methods Credit Hours: (3) MECH 3351 - Heat Transfer | Credit Hours: (3) Natural Science Elective Credit Hours: (4) CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Lab Credit Hours: (1) or BIOL 1110 - General Biology | Credit Hours: (3) BIOL 1111 - General Biology | Lab Credit Hours: (1) or ESCI 1020 - Landforms \*\* Credit Hours: (4) or ESCI 1040 - Physical Geology Credit Hours: (4) or ESCI 1050 - The Earth Through Time Credit Hours: (4) Total Hours: 17

### Semester Totals 33 hrs

### Senior Year

#### Fall Semester

MECH 4319 - Engineering Econ/Project Mgmt Credit Hours: (2)
MECH 4314 - Senior Design I Credit Hours: (3)
MECH 4300 - Prep/Professional Practice Credit Hours: (1)
MECH 4322 - System Dynamics Credit Hours: (3)
Humanities/Fine Arts Credit Hours: (3)\*
MECH Elective Credit Hours: (3)
MECH 4355 - Thermo/Heat Transfer Lab Credit Hours: (1)
Total Hours: 16

#### Spring Semester

MECH 4335 - System Dynamics Lab Credit Hours: (1) MECH 4323 - Senior Design II Credit Hours: (3) Technical Elective Credit Hours: (3)\*\* MECH Elective Credit Hours: (3) Humanities/Fine Arts Credit Hours: (3)\* ECON 2010 - Intro to Macroeconomics\*\* Credit Hours: (3) Total Hours: 16

### Semester Totals 32 hrs

## Total Hours Required for Graduation: 128

\*Must satisfy University General Education Program Requirement

\*\* An upper division course in engineering, mathematics, physics, or chemistry. Advisor's approval required.

## Accelerated B.S./M.S. Program

This program allows outstanding undergraduates to begin the coursework for the Master of Science in an engineering program during their senior year. Students are encouraged to begin planning to enter the Accelerated B.S./M.S. program early in their undergraduate career, in consultation with their advisor in their respective department.

Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study which will allow them to complete their B.S. degree while they also begin the coursework toward their M.S.

To apply, students must have a minimum 3.25 grade point average and must submit two reference letters and a copy of their transcript to their respective engineering department. Each applicant will complete an interview with the graduate academic coordinator in their respective engineering department.

Students must also apply to the Graduate School for the accelerated B.S./M.S. program, which allows them to take graduate courses in their respective engineering department. To continue in the program past the B.S., students must apply for full admission into the Graduate School and into their respective engineering department's M.S. program.

Only in ABM programs, up to 9 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to undergraduate GPA.

# Kemmons Wilson School of Hospitality and Resort Management

1080

Dr. Radesh Palakurthi, Dean Wilson School 141 (901) 678-3430 https://www.memphis.edu/wilson/

The primary goal of the Hospitality and Resort Management program is to produce graduates who have the knowledge and skills necessary for them to be successful in the increasingly competitive hospitality business environment. Hospitality and Resort Management is committed to expanding the general business knowledge, specific hospitality skills, and overall technical competence of both students and faculty who matriculate and educate within this program.

Program objectives of the B.S. in Sport and Leisure Management are: (a) to become involved in the profession and committed to the academic, service, and social mission of the profession; (b) to demonstrate an awareness of the critical role of diversity to the delivery of inclusive sport and leisure services; (c) to demonstrate effective leadership within the sport and leisure profession; and (d) to behave in accordance with the ethical standards of the sport and leisure profession.

# Graduation

In addition to specific course requirements listed below, students must complete the following:

Minimum of 120 semester hours of which at least 45 hours must be upper division and at least 45-51 hours must be liberal content courses. Overall minimum GPA of 2.00.

A minimum GPA of 2.00 in all credits earned at the University of Memphis excluding all credit transferred from other institutions.

A minimum GPA of 2.25 in all courses required for fulfilling the completion of the major.

**NOTE:** Any courses taken in excess of those needed to fulfill the requirements of the major are considered to be general electives and are included only in the calculation of the overall GPA. In those areas where students are required to take elective courses, the student in consultation with and approval of the major advisor, designates where the elective courses are to be applied.

# Sport & Leisure Management

# Sport & Leisure Management (B.S.)

The program objectives of the B.S. in Sport and Leisure Management (SLM) are: (a) to become involved in the profession and committed to the academic, service, and social mission of the profession; (b) to demonstrate an awareness of the critical role of diversity to the delivery of inclusive sport and leisure services; (c) to demonstrate effective leadership within the sport and leisure profession; and (d) to behave in accordance with the ethical standards of the sport and leisure profession.

## University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements. The following are recommended or required for the major: Social/Behavioral Sciences: ECON (TNe) 2010 is required.

## The Major (79 hours)

Core Requirements (31 hours) SLS 2105 - Foundation/Sport/Leisure Mgt \*\* Credit Hours: (4) SLS 3104 - Commercial Rec and Tourism \*\* Credit Hours: (3) SLS 3105 - Sport/Leisure as Pop Culture \*\* Credit Hours: (3) SLS 3204 - Org Analysis Sport/Leisure \*\* Credit Hours: (3) SLS 3605 - Financial Management SLS \*\* Credit Hours: (3) SLS 3650 - Promotions in Sport & Leisure \*\* Credit Hours: (3) SLS 4135 - Sport/Culture Global Perspect \*\* Credit Hours: (3)
SLS 4155 - Sport/Leisure Governance \*\* Credit Hours: (3)
SLS 4205 - Legal Aspects SLM \*\* Credit Hours: (3)
SLS 4500 - Sport/Leisure Mktg \*\* Credit Hours: (3)
SLS Electives (27-48 hours)
Includes all SLS/SLC courses not required in the major core and:
HPRM 2007 - Resort Management Credit Hours: (1)
HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2)
HPRM 2999 - Purchase/Hospitality Industry Credit Hours: (1)
HPRM 3130 - Hospitality Law Ethics & Risk Credit Hours: (3)
HPRM 3600 - Entertainment Management Credit Hours: (3)

## General Electives (0-21 hours) to bring the total hours to 120.

# Accelerated B.S. in Sport and Leisure Management/M.S in Sport Commerce

The Accelerated Bachelor's/Master's (ABM) degree program is a B.S. in Sport and Leisure Management/M.S in Sport Commerce. This program allows outstanding undergraduate students to begin the coursework for the M.S. in Sport Commerce during their senior year. Students are encouraged to begin planning to enter the ABM program early in their undergraduate career in consultation with their advisor. Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study that will allow them to complete their B.S. in Sport and Leisure Management degree while also beginning coursework toward their M.S. in Sport Commerce degree.

To apply, students must have a minimum 3.25 grade point average, submit two letters of reference, and provide a copy of their academic transcript to the Kemmons Wilson School of Hospitality and Resort Management. Each applicant will complete an interview with the graduate academic coordinator of the M.S. in Sport Commerce program. To continue in the program past the B.S. in Sport and Leisure Management, students must apply for full admission to both the Graduate School and the M.S. in Sport Commerce program. In the ABM program, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to a student's undergraduate grade point average.

# Typical 4-Year Sport & Leisure Management Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Social/Behavioral Sciences\* Mathematics\* Humanities/Fine Arts\* General Elective
ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) Natural Science/Lab\* Humanities/Fine Arts\* History\*

Semester Totals : 31 hours

## Sophomore Year

```
Natural Science/Lab*

Literature

SLS 2105 - Foundation/Sport/Leisure Mgt ** Credit Hours: (4)

SLS Elective

ECON (TNe) 2010 - Intro to Macroeconomics** Credit Hours: (3)

History*

SLS 3204 - Org Analysis Sport/Leisure ** Credit Hours: (3)

SLS 3605 - Financial Management SLS ** Credit Hours: (3)
```

#### Semester Totals: 29 hours

#### Junior Year

SLS 3104 - Commercial Rec and Tourism \*\* Credit Hours: (3)
SLS 3105 - Sport/Leisure as Pop Culture \*\* Credit Hours: (3)
SLS 4500 - Sport/Leisure Mktg \*\* Credit Hours: (3)
SLS Elective
SLS 2650 - Promotions in Sport & Leisure \*\* Credit Hours: (3)
SLS 4135 - Sport/Culture Global Perspect \*\* Credit Hours: (3)
SLS 4205 - Legal Aspects SLM \*\* Credit Hours: (3)
SLS Elective
SLS Elective
SLS 4205 - Legal Aspects SLM \*\* Credit Hours: (3)
SLS Elective
SLS Elective
SLS Elective

#### Semester Totals: 30 hours

#### Senior Year

SLS 4155 - Sport/Leisure Governance \*\* Credit Hours: (3) SLS Elective SLS Elective or General Elective SLS Elective or General Elective SLS Elective or General Elective SLS Elective SLS Elective SLS Elective SLS Elective SLS Elective SLS Elective

### Semester Totals: 30 hours

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Sport and Leisure Management/Sport Commerce (Accelerated B.S./M.S.)

The Accelerated Bachelor's/Master's (ABM) degree program is a B.S. in Sport and Leisure Management/M.S in Sport Commerce. This program allows outstanding undergraduate students to begin the coursework for the M.S. in Sport Commerce during their senior year. Students are encouraged to begin planning to enter the ABM program early in their undergraduate career in consultation with their advisor. Working with the undergraduate and graduate academic coordinators, undergraduates selected into this program begin a carefully tailored course of study that will allow them to complete their B.S. in Sport and Leisure Management degree while also beginning coursework toward their M.S. in Sport Commerce degree.

To apply, students must have a minimum 3.25 grade point average, submit two letters of reference, and provide a copy of their academic transcript to the Kemmons Wilson School of Hospitality and Resort Management. Each applicant will complete an interview with the graduate academic coordinator of the M.S. in Sport Commerce program. To continue in the program past the B.S. in Sport and Leisure Management, students must apply for full admission to both the Graduate School and the M.S. in Sport Commerce program. In the ABM program, up to 12 hours of graduate coursework may be applied to both the undergraduate and graduate programs. However, any graduate coursework will not apply to a student's undergraduate grade point average.

# University General Education Program (41 hours)

# The Major (79 hours)

#### **Core Requirements (31 hours)**

- SLS 2105 Foundation/Sport/Leisure Mgt \*\* Credit Hours: (4) SLS 3104 - Commercial Rec and Tourism \*\* Credit Hours: (3) SLS 3105 - Sport/Leisure as Pop Culture \*\* Credit Hours: (3) SLS 3204 - Org Analysis Sport/Leisure \*\* Credit Hours: (3) SLS 3605 - Financial Management SLS \*\* Credit Hours: (3) SLS 3650 - Promotions in Sport & Leisure \*\* Credit Hours: (3) SLS 4135 - Sport/Culture Global Perspect \*\* Credit Hours: (3)
- SLS 4155 Sport/Leisure Governance \*\* Credit Hours: (3)

# **Hospitality & Resort Management**

The primary goal of the Hospitality and Resort Management program is to produce graduates who have the knowledge and skills necessary for them to be successful in the increasingly competitive hospitality business environment. Hospitality and Resort Management is committed to expanding the general business knowledge, specific hospitality skills, and overall technical competence of both students and faculty who matriculate and educate within this program. Program objectives for the B.A. in Hospitality and Resort Management are found here.

# Hospitality and Resort Management (B.A.)

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirement are in addition to the University General Education Program requirements.

# The Major (35 hours)

HPRM 1050 - Business of Hospitality Credit Hours: (3) HPRM 2011 - Hosp Ind Managerial Acct Credit Hours: (3) HPRM 2012 - Intro to Culinary Arts Credit Hours: (3) HPRM 3060 - Food & Bev. Production Theory Credit Hours: (1) HPRM 3061 - Food and Beverage Production Lab Credit Hours: (1) HPRM 3062 - Restaurant Management Service Lab Credit Hours: (1) HPRM 3130 - Hospitality Law Ethics & Risk Credit Hours: (3) HPRM 3315 - Hospitality Human Resource Mgmt Credit Hours: (3) HPRM 3320 - Hospitality Financial Mgmt Credit Hours: (3) HPRM 3331 - Lodging Hotel and Resort Operations Credit Hours: (2) HPRM 3311 - Pre-Intern & Prof Development Credit Hours: (3) HPRM 4301 - Event Management for HPRM/PR Credit Hours: (3) HPRM 4320 - Hospitality Services Mktg Credit Hours: (3)

# Electives (35-38 hours)

Electives may be chosen to bring the total number of hours to 120.

# Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Foreign Language/B.A. (3)
Mathematics* (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
HPRM 1050 - Business of Hospitality Credit Hours: (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Foreign Language/B.A. (3)
Elective (1)
Social/Behavioral Sciences* (4)
Fine Arts/B.A. (3)
```

## Semester Totals 29 hrs

## Sophomore Year

```
History* (3)

ENGL 2201 - Literary Heritage ** Credit Hours: (3) *

or

ENGL 2202 - Lit Heritage: African-American ** Credit Hours: (3) *

HPRM 2011 - Hosp Ind Managerial Acct Credit Hours: (3)

Social/Behavioral Sciences* (3)

Natural Science (4)

HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2)

HPRM 3331 - Lodging Management Lab Credit Hours: (1)

Elective (3)

Natural Science (4) *

Humanities/B.A.* (3)

HPRM 3911 - Pre-Intern & Prof Development Credit Hours: (3)
```

## Semester Totals 31 hrs

## Junior Year

History\* (3) HPRM 3060 - Food & Bev. Production Theory **Credit Hours:** (1) HPRM 3061 - Food and Beverage Production Lab **Credit Hours:** (1) HPRM 3130 - Hospitality Law Ethics & Risk **Credit Hours:** (3) HPRM 3315 - Hospitality Human Resource Mgmt **Credit Hours:** (3) Elective (3) Humanities/Fine Arts\* (3) HPRM 3320 - Hospitality Financial Mgmt **Credit Hours:** (3) Elective (4) HPRM 3062 - Restaurant Management Service Lab **Credit Hours:** (1)

## Semester Totals 30 hrs

## Senior Year

HPRM 4301 - Event Management for HPRM/PR Credit Hours: (3) HPRM 4620 - Hospitality Operational Anlys Credit Hours: (3) HPRM 4320 - Hospitality Services Mktg Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php Elective (3) Upper Division Elective (3) HPRM 4700 - Integrative Challenge Credit Hours: (3) Elective (3) Elective (3) HPRM 4911 - Hospitality Mgmt Internship Credit Hours: (2) Upper Division Elective (3)

#### Semester Totals 30 hrs

Total Hours: 120

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Hospitality and Resort Management - Culinary Arts Concentration (B.A.)

Students in the B.A. program in Hospitality and Resort Management wishing to receive specialized knowledge and skills in Culinary Arts can choose to complete 24 credit hours in the culinary arts area as part of their electives to earn the concentration designation. For more information contact kwci@memphis.edu

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (35 hours)

HPRM 1050 - Business of Hospitality Credit Hours: (3) HPRM 2011 - Hosp Ind Managerial Acct Credit Hours: (3) HPRM 2012 - Intro to Culinary Arts Credit Hours: (3) HPRM 3060 - Food & Bev. Production Theory Credit Hours: (1) HPRM 3061 - Food and Beverage Production Lab Credit Hours: (1) HPRM 3062 - Restaurant Management Service Lab Credit Hours: (1) HPRM 3130 - Hospitality Law Ethics & Risk Credit Hours: (3) HPRM 3315 - Hospitality Human Resource Mgmt Credit Hours: (3) HPRM 3320 - Hospitality Financial Mgmt Credit Hours: (3) HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2) HPRM 3311 - Lodging Management Lab Credit Hours: (3) HPRM 3911 - Pre-Intern & Prof Development Credit Hours: (3) HPRM 4301 - Event Management for HPRM/PR Credit Hours: (3) HPRM 4320 - Hospitality Services Mktg Credit Hours: (3) HPRM 4911 - Hospitality Mgmt Internship Credit Hours: (2)

# Culinary Arts Concentration (24 hours)

HPRM 3013 - Advanced Culinary Skills Credit Hours: (3) HPRM 3014 - Pastry & Baking Credit Hours: (3) HPRM 3015 - Food Analysis Credit Hours: (3) HPRM 3016 - Garde Manger Credit Hours: (3) HPRM 3018 - International Cuisine Credit Hours: (3) HPRM 3050 - Food/Beverage Controls Credit Hours: (3) HPRM 3810 - Food Safety & Sanitation in Hospitality Credit Hours: (3) HPRM 4012 - Senior Culinary Design Credit Hours: (3)

## Electives (11-14 hours)

Electives may be chosen to bring the total number of hours to 120.

## Typical 4-Year Culinary Arts Concentration Sequence

\*\*Class offered at the Kemmons Wilson Culinary Institute (Cordova)

### Freshman Year

First Semester

ENGL 1010 - English Composition\*\* Credit Hours: (3) Foreign Language/B.A. (3) Mathematics\* (3) History\* (3) HPRM 1050 - Business of Hospitality Credit Hours: (3)

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) History\* (3) Social/Behavioral Sciences\* (3) Fine Arts/B.A. (3) Elective (1) HPRM 2012 - Intro to Culinary Arts Credit Hours: (3) \*\*

#### Semester Totals 31 hours

#### Sophomore Year

First Semester HPRM 3911 - Pre-Intern & Prof Development Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) HPRM 3013 - Advanced Culinary Skills Credit Hours: (3) \*\* HPRM 3810 - Food Safety & Sanitation in Hospitality Credit Hours: (3) \*\* HPRM 2003 - Special Events Credit Hours: (1) Foreign Language/B.A. (3)

#### Second Semester

HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2) HPRM 3331 - Lodging Management Lab Credit Hours: (1) Foreign Language/B.A. (3) HPRM 2011 - Hosp Ind Managerial Acct Credit Hours: (3) Natural Science with lab (4) \*

#### Semester Totals 31 hours

Junior Year

First Semester COMM 2381 - Oral Communication \*\* Credit Hours: (3) Humanities/B.A.\* (3) Natural Science with lab\* (4) Social/Behavioral Sciences\* (3) HPRM 3014 - Pastry & Baking Credit Hours: (3)

#### Second Semester

HPRM 3130 - Hospitality Law Ethics & Risk Credit Hours: (3) HPRM 3062 - Restaurant Management Service Lab Credit Hours: (1) \*\* HPRM 3315 - Hospitality Human Resource Mgmt Credit Hours: (3) HPRM 3018 - International Cuisine Credit Hours: (3) \*\* HPRM 3050 - Food/Beverage Controls Credit Hours: (3) \*\*

#### Semester Totals 30 hours

#### Senior Year

**First Semester** HPRM 4301 - Event Management for HPRM/PR **Credit Hours:** (3) \*\* HPRM 3015 - Food Analysis **Credit Hours:** (3) \*\* HPRM 4320 - Hospitality Services Mktg **Credit Hours:** (3) \*\* HPRM 3016 - Garde Manger **Credit Hours:** (3) \*\* HPRM 3061 - Food and Beverage Production Lab **Credit Hours:** (1)

#### Second Semester

HPRM 4012 - Senior Culinary Design Credit Hours: (3) \*\* HPRM 4911 - Hospitality Mgmt Internship Credit Hours: (2) HPRM 3017 - Culinary Procurement & Purchasing Credit Hours: (3) \*\* HPRM 3650 - Comm & Rec Food Serv Mgmt Credit Hours: (3) HPRM 3680 - Intro to Wine & Spirits Credit Hours: (3)

Semester Totals 28 hours

## Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Hospitality and Resort Management - Lodging Management Concentration (B.A.)

University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# College and Degree (B.A.) Requirements (6-9 hours)

The College and Bachelor of Arts requirements are in addition to the University General Education Program requirements that are listed above.

# The Major (35 hours)

HPRM 1050 - Business of Hospitality Credit Hours: (3) HPRM 2011 - Hosp Ind Managerial Acct Credit Hours: (3) HPRM 2012 - Intro to Culinary Arts Credit Hours: (3) HPRM 3060 - Food & Bev. Production Theory Credit Hours: (1) HPRM 3061 - Food and Beverage Production Lab Credit Hours: (1) HPRM 3062 - Restaurant Management Service Lab Credit Hours: (1) HPRM 3130 - Hospitality Law Ethics & Risk Credit Hours: (3) HPRM 3315 - Hospitality Human Resource Mgmt Credit Hours: (3) HPRM 3320 - Hospitality Financial Mgmt Credit Hours: (3) HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2) HPRM 3331 - Lodging Management Lab Credit Hours: (1) HPRM 3911 - Pre-Intern & Prof Development Credit Hours: (3) HPRM 4301 - Event Management for HPRM/PR Credit Hours: (3) HPRM 4301 - Hospitality Services Mktg Credit Hours: (3) HPRM 4911 - Hospitality Mgmt Internship Credit Hours: (2)

# Lodging Management Concentration (21 hours)

HPRM 4007 - Resort and Timeshare Mgmt Credit Hours: (3) HPRM 4331 - Adv Resort/Lodging Management Credit Hours: (3) HPRM 4340 - Information Technology HPRM Credit Hours: (3) HPRM 4350 - Properties Develomnt/Planning Credit Hours: (3) HPRM 4400 - International Hospitality Credit Hours: (3) HPRM 4620 - Hospitality Operational Anlys Credit Hours: (3) HPRM 4700 - Integrative Challenge Credit Hours: (3)

# Electives (14-17 hours)

Electives may be chosen from HPRM courses to bring the total number of hours to 120.

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Minors

# **Culinary Arts Minor**

The 18 hour minor is designed for students that would like to gain basic hands-on expertise and knowledge in Culinary Arts. Students will learn basic knife skills, sanitation, cooking methods, culinary terminology, nutrition analysis, and menu planning. Students choosing this minor can secure entry-level positions in the foodservice industry or start second careers in the hospitality industry. The minor can also serve as elective courses for students in other majors. For more information contact kwci@memphis.edu

# Requirements:

HPRM 2012 - Intro to Culinary Arts Credit Hours: (3) HPRM 3013 - Advanced Culinary Skills Credit Hours: (3) HPRM 3014 - Pastry & Baking Credit Hours: (3) HPRM 3015 - Food Analysis Credit Hours: (3) HPRM 3016 - Garde Manger Credit Hours: (3) HPRM 3810 - Food Safety & Sanitation in Hospitality Credit Hours: (3)

# Food and Beverage Management Minor

This 18-credit Food and Beverage Management minor is specifically designed for students who are interested in managing and/or owning restaurants or other food and beverage establishments. The minor will provide a foundation in food and beverage management, account and cost controls, and

advanced knowledge and understanding of the skills needed to succeed personally and professionally as a manager/owner in this ever-growing industry. Students will apply management principles and develop their culinary skills in the new restaurant and special event space at the Kemmons Wilson Culinary Institute.

1089

## Required Courses: 18 hours

HPRM 2012 - Intro to Culinary Arts **Credit Hours:** (3) HPRM 2999 - Purchase/Hospitality Industry **Credit Hours:** (1) HPRM 3050 - Food/Beverage Controls **Credit Hours:** (3) HPRM 3060 - Food & Bev. Production Theory **Credit Hours:** (1) HPRM 3061 - Food and Beverage Production Lab **Credit Hours:** (1) HPRM 3062 - Restaurant Management Service Lab **Credit Hours:** (1) HPRM 3680 - Intro to Wine & Spirits **Credit Hours:** (3) HPRM 3810 - Food Safety & Sanitation in Hospitality **Credit Hours:** (3) HPRM 4911 - Hospitality Mgmt Internship **Credit Hours:** (2)

# **Hospitality and Resort Management Minor**

## Requirements

To receive a minor in Hospitality and Resort Management, the student is required to take 18 credit hours as follows:

HPRM 1050 - Business of Hospitality Credit Hours: (3)

HPRM 2012 - Intro to Culinary Arts Credit Hours: (3)

HPRM 3330 - Managing Hotel and Resort Operations Credit Hours: (2)

HPRM 3331 - Lodging Management Lab Credit Hours: (1)

HPRM 4320 - Hospitality Services Mktg Credit Hours: (3)

HPRM 4620 - Hospitality Operational Anlys Credit Hours: (3)

HPRM 4700 - Integrative Challenge Credit Hours: (3)

# **Pastry and Baking Minor**

In this 18-credit hour minor, the expert instructors at the Kemmons Wilson Culinary Institute will cover baking and pastry techniques as well as kitchen and restaurant management skills in our new state-of-the-art facility. The Pastry and Baking Minor will provide specialized academic and technical skills that will help prepare students for careers as pastry chefs and bakery managers.

## Required Courses: 18 hours

HPRM 2012 - Intro to Culinary Arts Credit Hours: (3)

HPRM 3014 - Pastry & Baking Credit Hours: (3)

HPRM 3021 - Artisan Breads and Pastries Credit Hours: (3)

HPRM 3022 - Plated Desserts Credit Hours: (3)

HPRM 3023 - Chocolate and Confections Credit Hours: (3)

HPRM 3024 - Contemporary Cakes Credit Hours: (3)

# **Special Events and Catering Management Minor**

In this 18-credit Special Events and Catering Management minor, students will gain a solid understanding of the planning, organizing, and execution of a multitude of special events. Students will gain experiential learning opportunities in all facets of the industry in the new restaurant and special event space at the Kemmons Wilson Culinary Institute. This minor will allow the students to gain specific competencies that are directly related in the very popular and ever-growing special events and catering management industry.

# Required Courses: 18 hours

HPRM 2003 - Special Events Credit Hours: (1)
HPRM 2012 - Intro to Culinary Arts Credit Hours: (3)
HPRM 3050 - Food/Beverage Controls Credit Hours: (3)
HPRM 4021 - Banquet and Catering Management Credit Hours: (3)
HPRM 4022 - Special Events Management Capstone Credit Hours: (3)
HPRM 4301 - Event Management for HPRM/PR Credit Hours: (3)
HPRM 4911 - Hospitality Mgmt Internship Credit Hours: (2)

# **Culinary Essentials Certificate**

The Culinary Essentials Certificate (CEC) is a two semester (23-credit hour) undergraduate certificate program at the *Kemmons Wilson Culinary Institute* (KWCI) that prepares students to enter the culinary workforce in settings such as restaurants, country clubs, resorts, hotels, and many other food service opportunities. Students learn culinary arts fundamentals—cooking methods, flavor development, fabrication techniques, world cuisines, baking and pastry, sanitation and safety, nutritional analysis and culinary math. Students work in a hands-on and immersive environment since twothirds of the CEC Program is the practical application of knowledge and skills gained. The teaching facility is a 32,000 sq-ft, state-of-the-art culinary lab facility at the *Kemmons Wilson Culinary Institute*. The CEC Program requires a 240-hour internship to further bridge classroom learning with practical applications in the culinary field. To enhance the internship, the CEC Program also emphasizes career, entrepreneurial, and personal development skills during the program.

## First Semester Courses (12 hours):

HPRM 2012 - Intro to Culinary Arts **Credit Hours:** (3) HPRM 2013 - Intermediate Culinary Techniques **Credit Hours:** (3) HPRM 2014 - Culinary Leadership & Professionalism **Credit Hours:** (3) HPRM 2015 - A la Carte & Restaurant Service **Credit Hours:** (3)

## Second Semester Courses (11 hours):

HPRM 2016 - Essentials of Pastry & Baking Credit Hours: (3) HPRM 2017 - Food Composition & Sanitation Credit Hours: (3) HPRM 2018 - Intro to Garde Manger Credit Hours: (3) HPRM 2019 - Culinary Internship Credit Hours: (2)

# Loewenberg College of Nursing

The Loewenberg College of Nursing

Lin Zhan, Ph.D., RN, FAAN, Dean & Professor 4055 North Park Loop, 2502 Community Health Building; (901) 678-2020 http://nursing.memphis.edu

# **Purposes**

The primary function of The Loewenberg College of Nursing is to offer a program of study designed to prepare students for careers in professional nursing. As a part of a comprehensive university, the college is dedicated to developing scholarship in nursing and providing services that support the institutional mission.

The program is designed to accommodate the needs of high school graduates, transfer students, college graduates, licensed practical nurses, and registered nurses who are graduates of diploma or associate degree nursing programs. The college is committed to: (1) providing a curriculum leading to the degree of Bachelor of Science in Nursing basic to beginning professional practice and graduate study in nursing; (2) promoting the intellectual, personal and professional development of students by offering a curriculum that combines a strong liberal education with the professional major; (3) providing a plan of study with flexible options that are responsive to the individual learner's needs; (4) encouraging the use of opportunities available in a comprehensive university setting to foster values, attitudes and personal qualities essential to living a fulfilling life and contributing to a diverse society, (5) producing politically and socially conscious graduates who are competent practitioners in a variety of settings; and (6) preparing graduates who assume leadership roles to effect change for a healthy society.

Graduates of the program are eligible to apply to take the NCLEX examination for state licensure through the respective state boards of nursing. Program applicants should be aware that conviction of the following crimes would make the student ineligible for Registered Nurse licensure in the State of Tennessee: Aggravated Assault as in T.C.A. 39-13-102; First Degree Murder, as in T.C.A. 39-13-202; Second Degree Murder, as in T.C.A. 39-13-207; Voluntary Manslaughter, as in T.C.A. 39-13-211; False Imprisonment, as in T.C.A. 39-13-302; Kidnapping, as in T.C.A. 39-13-303; Aggravated Kidnapping, as in T.C.A. 39-13-304; Especially Aggravated Kidnapping, as in T.C.A. 39-13-305; Robbery, as in T.C.A. 39-13-401; Aggravated Robbery, as in T.C.A. 39-13-402; Especially Aggravated Robbery, as in T.C.A. 39-13-403; Aggravated Rape, as in T.C.A. 39-13-503; Aggravated Sexual Battery, as in T.C.A. 39-13-504; Sexual Battery, as in T.C.A. 39-13-505; Statutory Rape, as in T.C.A. 39-15-506; Theft of Property, as in T.C.A. 39-14-103; Theft of Services, as in T.C.A. 39-14-104; Forgery, as in T.C.A. 39-14-302; Burglary, as in T.C.A. 39-14-402; Aggravated Burglary, as in T.C.A. 39-14-404; Incest, as in T.C.A. 39-15-302; Aggravated Child Abuse, as in T.C.A. 39-15-402; Sexual Exploitation of a Minor, as in T.C.A. 39-17-1003; Aggravated Sexual Exploitation of a Minor, as in T.C.A. 39-17-1005; Assisted Suicide, as in T.C.A. 39-13-216; Rape of a Child, as in T.C.A. 39-13-522.

#### Organization

The Loewenberg College of Nursing is organized as one unit under the leadership of a dean. The curriculum leading to the degree of Bachelor of Science in Nursing includes general education and support courses offered through other units of the university as well as the major requirements offered by the college. A comprehensive approach to health care is emphasized through utilization of a wide variety of health care settings available in Memphis and the surrounding community.

The faculty of the Loewenberg College of Nursing represents all clinical areas of nursing practice and a variety of experiences and interests. They reflect this diversity in their teaching, practice and research and are qualified by practical experience as well as by academic credentials, to function as facilitators of learning.

The Loewenberg College of Nursing holds membership in the American Association of Colleges of Nursing, Southern Council for Collegiate Education in Nursing, and the National League for Nursing. The baccalaureate degree program in nursing and master's degree program in nursing at the Loewenberg College of Nursing are accredited by the Commission on Collegiate Nursing Education, 655 K Street, NW, Suite 750, Washington, DC 20001, 202-887-6791. The programs are also fully approved by the Tennessee Board of Nursing

# **Program Outcomes**

Provide safe and high-quality nursing care across a continuum of healthcare environments.

Use evidence based research, informatics, and technologies in nursing practice to improve the health of diverse populations.

Explore the impact of socio-cultural, economic, legal and political factors that shape healthcare delivery and professional nursing practice. Communicate and collaborate effectively both inter-professionally and intra-professionally.

Implement clinical prevention and health promotion strategies to improve patient health outcomes.

Demonstrate professional values and ethical behaviors in all dimensions of nursing practice.

# **Degree Requirements**

- To qualify for the degree of Bachelor of Science in Nursing, the student must complete a minimum of 120 semester hours with the minimum overall grade point average of 2.0 and must meet specific grade requirements described below.
- A minimum grade of "C" must be earned for English 1010 and 1020 and each required math, social science, nutrition, science, upper division, and each required nursing course.
- Detailed course requirements are described below under General Education Program Requirements, Other Support Course Requirements, and Nursing Course Requirements.

#### Admission

Because the University of Memphis seeks to provide in as much as possible a reasonably safe environment for its health career students and their patients, students may be required during the course of the program to demonstrate their physical and/or emotional fitness to meet the essential requirements of the program. Such essential requirements include freedom from communicable diseases, the ability to perform certain physical tasks, and suitable emotional fitness. Any appraisal measures used to determine such physical and/or emotional fitness will be in compliance with Section 504 of the Rehabilitation Act of 1973 and the American with Disabilities Act of 1990, so as not to discriminate against any individual on the basis of disability. See specific criteria under Sophomore Admission.

Core performance standards for admission and progression:

Critical thinking ability sufficient for clinical judgment.

Interpersonal abilities sufficient to interact with individuals, families, and groups from a variety of social, emotional, cultural, and intellectual backgrounds.

Communication abilities sufficient for interaction with others in verbal and written form.

Physical abilities sufficient to move from room to room and maneuver in small spaces.

Gross and fine motor abilities sufficient to provide safe and effective nursing care.

Auditory ability sufficient to monitor and assess health needs.

Visual ability sufficient for observation and assessment necessary in nursing care.

Tactile ability sufficient for physical assessment.

#### Freshman Admission Requirements and Criteria

High School students may apply in their senior year to the Loewenberg College of Nursing. Pre-Admission is highly selective. Applicants are ranked based on the GPA and ACT. Only the top ranked applicants will be offered pre-admission. Applicants who meet the following criteria are eligible to apply for pre-admission:

Submission of a completed online application to the Loewenberg College of Nursing (LCON) prior to the published deadline.

Completion of high school Algebra I, II, Geometry, Biology, and Chemistry.

Minimum ACT score of 23 with a minimum score of 21 in all areas.

Graduation from an accredited high school with a cumulative grade point average of 3.0.

#### **BSN Admission Requirements and Criteria**

Admission to the UofM as a degree seeking undergraduate student for the current application term.

Submission of a completed online application to the Loewenberg College of Nursing (LCON) prior to the published deadline.

Achievement of a minimum college cumulative GPA of 2.7 at the time of application.

Completion of general education requirements prior to enrollment is strongly advised; applicants may have no more than 6 general education credit hours to be completed.

Completion of all prerequisite courses prior to enrollment; a minimum grade of "C" must be earned. Courses include:

-English Comp I & II, Intro Sociology or General Psychology, Math 1420, 1530, 1710, 1730, 1830, or 1910 and Nutrition;

-Anatomy & Physiology I (with lab), Anatomy & Physiology II (with lab), and Microbiology (with lab).

Accelerated BSN admission criteria include a baccalaureate degree and completion of Math 1530 or equivalent.

- Completion of two of three (2 of 3) prerequisite science courses at the time of application and all three prior to enrollment. Science courses include: Anatomy & Physiology I (with lab), Anatomy & Physiology II (with lab), and Microbiology (with lab).
  - Applicants are required to complete prerequisite science courses within seven (7) years of LCON admission earning a minimum combined GPA of 2.66.
  - Preference will be given to those students who completed all science pre-requisites and meet the required GPA at the time of application.
  - One (1) science course may be repeated once; the second earned letter grade of the first repeated course will be used in the science GPA calculation. The first earned letter grade for the remaining two (2) science courses will be used in the science GPA calculation.
  - Students with two (2) or more science pre-requisite courses in-progress at the time of application will only be considered for admission with completion of two (2) college general science courses (for science majors) earning a grade of "C" or better on the first attempt. The highest 1st attempt course grades will be used in the science GPA calculation.

Clearance of all high school deficiencies.

- Applicants transferring from or previously enrolled in another nursing program must submit a letter of good standing or support from the dean/director of the previous nursing program, along with an official transcript, and meet LCON admission and progression standards as stated in the Undergraduate Catalog. Students earning a grade of D or F for one or more nursing courses within five (5) years of application are not eligible for admission.
- Have a minimum TOEFL score of 173 computer-based, 61 Internet-based, or 500 paper-pencil, or a minimum IELTS score of 5.0 (for students for whom English is a second language).

#### **RN-BSN Admission Requirements and Criteria**

Be admitted to the University of Memphis as a degree-seeking undergraduate student.

Submission of a completed online application to the Loewenberg College of Nursing (LCON) prior to the published deadline.

Have a minimum college cumulative grade point average of 2.5, a cumulative grade point average of 2.00 in prerequisite science courses.

Completion of prerequisite courses with a minimum grade of "C" or better. Prerequisite courses include:

- English Comp I & II, Intro Sociology or General Psychology, Math 1420,1530, 1710, 1730, 1830, or 1910 and Nutrition, Anatomy & Physiology I (with lab), Anatomy & Physiology II (with lab), and Microbiology (with lab).

Prerequisite science courses completed later than seven (7) years of LCON admission may be accepted with validation from current healthcare employer.

Hold an unencumbered, active RN license.

#### **BSN Admission Selection Process**

BSN applicants are considered on a competitive space available basis for the Memphis and Lambuth campuses

- For each campus, applicants are rank-ordered by cumulative GPA (40%), weighted Science GPA (40%), and weighted Math grade (20%).
   A minimum of two science courses are used to calculate the Science GPA; general science grades (for science majors) are used if two or more science prerequisites are in-progress. The highest weight is applied to the Science GPA derived from all three prerequisite science courses. Consideration will be given to those students who completed all science pre-requisites and meet the required GPA at the time of application. General science grades (for science majors) are used if two science pre-requisites are in progress. The lowest weight is applied to the science GPA derived from two general science courses.
  - For students who complete more than one math course, the higher course grade is used to calculate the weighted Math grade. The highest weight is applied to the MATH 1530, MATH 1710, MATH 1730, MATH 1830, or MATH 1910 course grade. A lower weight is applied to the Math 1420 course grade.

A rank ordered alternate list may be established each semester to fill vacancies that might occur before the beginning of class. Students who are not accepted must reapply to be considered for another admissions cycle.

High School seniors must complete applications for Freshmen Pre-Admittance by January 1. Pre-admitted students will enter the College of Nursing in the 4<sup>th</sup> semester at the University of Memphis. Pre-admitted students who do not enter the College of Nursing in their specified semester will forfeit their guaranteed seat and will be required to re-apply for admission to the nursing program.

Traditional BSN applicants must have complete files by the deadlines (Fall: February 15; Spring: September 1) to be considered.

Accelerated BSN applicants must have complete files by the deadline (Fall: February 15) to be considered. Accelerated BSN only admits during the Fall semester.

# **Advanced Placement Admission - RN Students**

#### **Advanced Placement Admission**

To be admitted with advanced placement, the Registered Nurse must:

Be admitted to the University of Memphis as a degree-seeking undergraduate student.

Have current licensure as a Registered Nurse in Tennessee.

Submit evidence of recent clinical practice.

Have a minimum college cumulative grade point average of 2.7.

Have completed specified courses with a minimum grade of "C": ENGL 1010, ENGL 1020 (6); BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021 (8), MATH 1420, MATH 1530, or MATH 1830, MATH 1910 or 2000, BIOL 1230/BIOL 1231 (4); SOCI 1111 or PSYC 1200; NUTR 3202\*.

Minimum of 2.66 cumulative grade point average in required laboratory science courses: BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021; BIOL 1230/BIOL 1231. A prerequisite science course may be repeated only once to earn a minimum grade of "C". A maximum of two prerequisite science courses may be repeated to earn the minimum required grade.

Must meet the Sophomore Admission Criteria identified earlier, except that NCLEX is required.

\*Credit in NUTR 2202 may also be used to meet this course requirement

#### Accelerated Second Degree BSN Program Option

#### **Accelerated Second Degree**

Accelerated Second Degree BSN Program Options

The graduate with a non-nursing Bachelor's degree may choose to enroll in the Accelerated Second Degree BSN Program Option. The 16-month program allows students to master theoretical and clinical knowledge and skill needed to become a professional nurse who is prepared to positively influence nursing and the health of the global community. Enrollment in the Accelerated Second Degree BSN Program Option is in the fall semester and consists of three semesters and one summer of the nursing major. More information is located on the Loewenberg College of Nursing website.

# **Academic Advising**

#### Advising

Students who are completing courses required for admission to the Loewenberg College of Nursing (LCON) receive advising through the Academic Counseling Center. However, questions about admission requirements may be addressed to the Assistant Dean of Nursing Students in the Loewenberg College of Nursing.

Following admission to LCON, each student is assigned an Academic Advisor from the college. The Academic Advisor will assist the student in planning for completion of the BSN program and will provide the opportunity for meaningful discussion regarding academic progress and career goals. This assistance, however, does not in any way relieve the student of the primary responsibility for studying the Undergraduate Catalog and fulfilling all the requirements for the degree.

# **Financial Aid and Scholarships**

#### **Financial Aid**

Students are encouraged to complete applications and forms for financial aid. These are available in the Student Financial Aid Office. Some scholarships are also available through the Loewenberg College of Nursing. These scholarship applications are available in the college's office.

# **Scholarships**

More than a dozen scholarships and loans exist to support the education of LCON students. All nursing students are encouraged to apply for a nursing scholarship each year through Tiger Scholarship Manager. Scholarship applications for the following academic year are accepted from early November to late January.

1095

# Fees

Practicum nursing courses require an additional fee of \$60 and Skills Laboratory courses an additional fee of \$50 and \$122. Theory courses have an additional fee of \$25 for testing. These fees are not included in the Fee Schedule

# Residency

University residence requirements are explained in detail in the Graduation from the University section of this catalog. Note that students transferring from a community or junior college must complete a minimum of sixty semester hours in an accredited senior institution. In addition, 30 of the last 60 semester hours for the degree must be completed at the University of Memphis.

# **Progression in the Nursing Major**

- A nursing course may only be entered twice.
- A minimum grade of "C" must be earned in each nursing course to progress. Failure to earn a minimum grade of "C" will require repeating the course before attempting other nursing courses.
- When the theory or clinical component of any course sequence must be repeated, the companion course must also be repeated even though a satisfactory grade has been earned.
- Irregular progression students who are out of clinical nursing course work for longer than three months will be reviewed by the Associate Dean who may require testing or the repetition of courses in which satisfactory grades have been earned.

# **Disqualification from the Nursing Major**

Failure to earn a minimum grade of "C" or better, or "S" (clinical) when repeating a nursing course.

Failure to earn a "C" or better, or "S" (clinical) in two nursing courses.

Professional/academic misconduct or dishonesty.

Falsification of any academic/medical/nursing record or misrepresentation of nursing care or credential.

Clinical practice that places patients in physical or emotional jeopardy after the student is taught otherwise.

Failure to adhere to LCON substance abuse policy.

# **Clinical Nursing Course Requirements**

Before enrolling in a clinical nursing course, students must present evidence of current CPR certification, professional liability insurance (\$1,000,000 per occurrence/\$3,000,000 aggregate minimum coverage), criminal background and credential check, appropriate immunizations and titers, and a statement of good health, including a negative PPD skin test or chest x-ray. Immunizations and titers include DT, measles, mumps, polio, Hepatitis B; Rubella vaccine or titer showing immunity; varicella titer. The basic nursing student will pay for malpractice insurance at fee payment. RN students must purchase their own insurance and present evidence prior to enrolling in clinical nursing courses. RN students are also required to present evidence of current licensure in Tennessee.

Students are encouraged to complete these requirements during the semester prior to anticipated enrollment. No student will be allowed to participate in clinical learning experiences until these requirements are satisfied.

# **Credit by Exam**

Credit for some of the upper division nursing courses may be earned through credit by examination. Other methods of earning credit are explained in detail in the Academic Regulations section of this Catalog.

# **RN Licensure**

Upon graduation from the program, graduates are eligible to take the NCLEX examination for licensure at testing sites determined by the Tennessee Board of Nursing.

# **Student Organization**

Students are encouraged to join their professional organization, Student Nurses' Association. This is the local chapter of the National Student Nurses' Association.

Senior students who have achieved a 3.0 cumulative grade point average, ranked in the top 35% of their graduating class, meet the expectation of academic integrity, and who are recommended by faculty are eligible to apply for induction into Sigma Theta Tau, Beta Theta Chapter at Large of the international nursing honor society.

# Nursing, (B.S.N.)

# University General Education Program (41 hours)

See Graduation from the University for University General Education Program requirements. Note the following requirements are specified for this program:

## Natural Science:

BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) \* BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) \* BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) \* BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) \*

## Social/Behavioral Sciences:

PSYC 1030 - General Psychology\*\* Credit Hours: (3) or SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3)

# Support Courses for Nursing Major (10 hours)

All support courses must be completed with a minimum cumulative grade of "C".

## Microbiology (4 hours):

Science courses must have a minimum cumulative grade point average of 2.66 and must have been completed in the past 7 years. Refer to Science Course Validation section below.

```
BIOL 1230 - Microbiology ** Credit Hours: (3)
BIOL 1231 - Microbiology Lab ** Credit Hours: (1)
```

## Nutrition (3 hours):

```
NUTR 2202 - Nutrition ** Credit Hours: (3)
or
NUTR 3202 - Nutrition/Health Care Credit Hours: (3)
```

## Statistics (3 hours):

If MATH 1530 is used for math general education course and support course, the student will need an elective course for the additional 3 hours.

```
MATH 1530 - Prob/Statistics/Non Calculus** Credit Hours: (3)
EDPR 4541 - Fundmntl/Applied Stat Method Credit Hours: (3)
SOCI 3311
```

with a minimum grade of "C"

## The Major (66 hours)

## Completion of

NURS 3005 - Intro Professional Nursing ** Credit Hours: (2)
NURS 3006 - Professional Nursing Seminar ** Credit Hours: (1)
NURS 3105 - Foundations PT-Centered Care Credit Hours: (3)
NURS 3106 - Foundational Nursing Skills Credit Hours: (2)
NURS 3000 - Pharmacology in Nursing ** Credit Hours: (3)
NURS 3101 - Health Assessment ** Credit Hours: (2)
NURS 3103 - Health Assessment Lab Credit Hours: (1)
NURS 3205 - Nurs Adult I/Common HIth Alt Credit Hours: (3)
NURS 3206 - Nursing Adult I/Practicum Credit Hours: (3)
NURS 3127 - Mental Health Nursing Credit Hours: (3)
NURS 3129 - Mental Health Nurs Practicum Credit Hours: (1)
NURS 3217 - Nursing/Childbearing Family Credit Hours: (2)
NURS 3219 - Nurs Childbearing Family Pract Credit Hours: (2)
NURS 3227 - Pediatric Nursing Credit Hours: (2)
NURS 3229 - Pediatric Nursing Practicum Credit Hours: (2)
NURS 3230 - Gerontological Nursing Credit Hours: (3)
NURS 3231 - Gerontological Nurs Practicum Credit Hours: (3)
NURS 3305 - Nurs Adult II/Complex HIt Alt Credit Hours: (3)
NURS 3306 - Nurs Adult II/Complex Pract Credit Hours: (3)
NURS 3400 - Clinical Pathophysiology ** Credit Hours: (3)
NURS 4110 - Evidence Based Practice Nurs ** Credit Hours: (3)
NURS 4127 - Community Health Nursing ** Credit Hours: (3)
NURS 4129 - Community HIth Nurs Practicum ** Credit Hours: (1)
NURS 4205 - Transition Professional Nurs ** Credit Hours: (4)
NURS 4206 - Transition Prof Nurs Practicum ** Credit Hours: (4-8)

# Elective (3 hours)

Any upper division course at the 3000 or 4000 level.

## Nursing Course Requirements - Basic Students/Accelerated BSN Option

## Completion of

NURS 3005 - Intro Professional Nursing \*\* Credit Hours: (2) NURS 3006 - Professional Nursing Seminar \*\* Credit Hours: (1) NURS 3105 - Foundations PT-Centered Care Credit Hours: (3) NURS 3106 - Foundational Nursing Skills Credit Hours: (2) NURS 3000 - Pharmacology in Nursing \*\* Credit Hours: (3) NURS 3101 - Health Assessment \*\* Credit Hours: (2) NURS 3103 - Health Assessment Lab Credit Hours: (1) NURS 3205 - Nurs Adult I/Common HIth Alt Credit Hours: (3) NURS 3206 - Nursing Adult I/Practicum Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php NURS 3127 - Mental Health Nursing Credit Hours: (3) NURS 3129 - Mental Health Nurs Practicum Credit Hours: (1) NURS 3217 - Nursing/Childbearing Family Credit Hours: (2) NURS 3219 - Nurs Childbearing Family Pract Credit Hours: (2) NURS 3227 - Pediatric Nursing Credit Hours: (2) NURS 3229 - Pediatric Nursing Practicum Credit Hours: (2) NURS 3230 - Gerontological Nursing Credit Hours: (3) NURS 3231 - Gerontological Nurs Practicum Credit Hours: (3) NURS 3305 - Nurs Adult II/Complex HIt Alt Credit Hours: (3) NURS 3306 - Nurs Adult II/Complex Pract Credit Hours: (3) NURS 3400 - Clinical Pathophysiology \*\* Credit Hours: (3) NURS 4110 - Evidence Based Practice Nurs \*\* Credit Hours: (3) NURS 4127 - Community Health Nursing \*\* Credit Hours: (3) NURS 4129 - Community HIth Nurs Practicum \*\* Credit Hours: (1) NURS 4205 - Transition Professional Nurs \*\* Credit Hours: (4) NURS 4206 - Transition Prof Nurs Practicum \*\* Credit Hours: (4-8)

## Upper Division Elective (3 hours):

Any 3000-4000 course.

## Nursing Course Requirements - RN Students

## Nursing (31 hours):

NURS 3005 - Intro Professional Nursing ** Credit Hours: (2)
NURS 3006 - Professional Nursing Seminar ** Credit Hours: (1)
NURS 3101 - Health Assessment ** Credit Hours: (2)
NURS 3103 - Health Assessment Lab Credit Hours: (1)
NURS 3400 - Clinical Pathophysiology ** Credit Hours: (3)
NURS 3000 - Pharmacology in Nursing ** Credit Hours: (3)
NURS 4110 - Evidence Based Practice Nurs ** Credit Hours: (3)
NURS 4127 - Community Health Nursing ** Credit Hours: (3)
NURS 4129 - Community HIth Nurs Practicum ** Credit Hours: (1)
NURS 4205 - Transition Professional Nurs ** Credit Hours: (4)
NURS 4206 - Transition Prof Nurs Practicum ** Credit Hours: (4-8)

## Upper Division Elective (3 hours):

Any 3000-4000 course.

#### Note

The remaining hours for the major requirements are fulfilled by validation.

Under the Tennessee Career Mobility Plan registered nurses who have graduated from Tennessee schools or out-of-state Nursing accredited programs will be able to progress to the baccalaureate degree in nursing without testing to verify previous nursing education. Registered nurses articulating to the baccalaureate level may be awarded or transfer in nursing credits equivalent to approximately one year of nursing courses. For this to occur, a minimum grade of "C" must have been earned in previous nursing course work. Nursing credits transferred or awarded will be held in escrow. These credits will be placed on individual transcripts only after students have successfully completed 15 hours of nursing courses with a minimum grade of "C" in The Loewenberg College of Nursing. Non nursing credits are transferred according to university policies. Testing will be required for graduates of non Nursing accredited programs or for students who have not been in active clinical practice in the past three years.

The following represent typical schedule plans for basic students.

## **Basic BSN Students**

## **Freshman Year**

```
ENGL 1010 - English Composition** Credit Hours: (3)
BIOL 2010 - Anatomy/Physiology I** Credit Hours: (3)
or
BIOL 2011 - Anat/Physiology I Lab ** Credit Hours: (1)
Humanities (3) *
History (3) *
Social/Behavioral Sciences (3) *
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
or
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
History (3) *
MATH (3) *
Humanities (3) *
```

### Semester Totals 32 hrs

## Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) or ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) BIOL 1230 - Microbiology \*\* Credit Hours: (3) or BIOL 1231 - Microbiology Lab \*\* Credit Hours: (1) Social/Behavioral Sciences (3) \* NUTR 2202 - Nutrition \*\* Credit Hours: (3) or NUTR 3202 - Nutrition/Health Care Credit Hours: (3) COMM 2381 - Oral Communication \*\* Credit Hours: (3) NURS 3000 - Pharmacology in Nursing \*\* Credit Hours: (3) NURS 3400 - Clinical Pathophysiology \*\* Credit Hours: (3) NURS 3101 - Health Assessment \*\* Credit Hours: (2) NURS 3105 - Foundations PT-Centered Care Credit Hours: (3) NURS 3106 - Foundational Nursing Skills Credit Hours: (2)

## Semester Totals 30 hrs

### Junior Year

NURS 3005 - Intro Professional Nursing \*\* Credit Hours: (2) NURS 3006 - Professional Nursing Seminar \*\* Credit Hours: (1) NURS 3127 - Mental Health Nursing Credit Hours: (3) NURS 3129 - Mental Health Nurs Practicum Credit Hours: (1) NURS 3205 - Nurs Adult I/Common HIth Alt Credit Hours: (3) NURS 3206 - Nursing Adult I/Practicum Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php NURS 4127 - Community Health Nursing \*\* Credit Hours: (3) NURS 4129 - Community HIth Nurs Practicum \*\* Credit Hours: (1) NURS 4110 - Evidence Based Practice Nurs \*\* Credit Hours: (3) NURS 3217 - Nursing/Childbearing Family Credit Hours: (2) NURS 3219 - Nurs Childbearing Family Pract Credit Hours: (2) NURS 3230 - Gerontological Nursing Credit Hours: (3) NURS 3231 - Gerontological Nurs Practicum Credit Hours: (3) Statistics (3)

Semester Totals 33 hrs

## Senior Year

NURS 3305 - Nurs Adult II/Complex HIt Alt **Credit Hours:** (3) NURS 3306 - Nurs Adult II/Complex Pract **Credit Hours:** (3) NURS 3227 - Pediatric Nursing **Credit Hours:** (2) NURS 3229 - Pediatric Nursing Practicum **Credit Hours:** (2) Upper Div Elective (3) NURS 4205 - Transition Professional Nurs \*\* **Credit Hours:** (4) NURS 4206 - Transition Prof Nurs Practicum \*\* **Credit Hours:** (4-8)

#### Semester Totals 25 hrs

#### Note

\*Must satisfy University General Education Program Requirements

<sup>1</sup> Take one of the following: EDPR 4541, SOCI 3311, or any approved statistics course. If statistics was taken as your general education math, either MATH 1530, you may take an elective course.

## Progression Of Nursing Coursework:

All courses in group A must be completed before enrolling in any courses in group B. All courses in group B must be completed before enrolling in any courses in group C. All courses in group C must be completed before enrolling in any course in Group D. All courses in group D must be completed before enrolling in any course in Group E.

## Group A:

- NURS 3000 Pharmacology in Nursing \*\* Credit Hours: (3)
- NURS 3101 Health Assessment \*\* Credit Hours: (2)
- NURS 3103 Health Assessment Lab Credit Hours: (1)
- NURS 3105 Foundations PT-Centered Care Credit Hours: (3)
- NURS 3106 Foundational Nursing Skills Credit Hours: (2)
- NURS 3400 Clinical Pathophysiology \*\* Credit Hours: (3)

### Group B:

- NURS 3005 Intro Professional Nursing \*\* Credit Hours: (2)
- NURS 3006 Professional Nursing Seminar \*\* Credit Hours: (1)
- NURS 3127 Mental Health Nursing Credit Hours: (3)
- NURS 3129 Mental Health Nurs Practicum Credit Hours: (1)
- NURS 3205 Nurs Adult I/Common HIth Alt Credit Hours: (3)
- NURS 3206 Nursing Adult I/Practicum Credit Hours: (3)
- NURS 4127 Community Health Nursing \*\* Credit Hours: (3)
- NURS 4129 Community HIth Nurs Practicum \*\* Credit Hours: (1)

## Group C:

NURS 4110 - Evidence Based Practice Nurs \*\* Credit Hours: (3) NURS 3230 - Gerontological Nursing Credit Hours: (3) NURS 3231 - Gerontological Nurs Practicum Credit Hours: (3) NURS 3217 - Nursing/Childbearing Family Credit Hours: (2) NURS 3219 - Nurs Childbearing Family Pract Credit Hours: (2)

## Group D:

NURS 3227 - Pediatric Nursing Credit Hours: (2) \* NURS 3229 - Pediatric Nursing Practicum Credit Hours: (2) \* NURS 3305 - Nurs Adult II/Complex HIt Alt Credit Hours: (3) NURS 3306 - Nurs Adult II/Complex Pract Credit Hours: (3)

## Group E:

NURS 4205 - Transition Professional Nurs \*\* Credit Hours: (4) \* NURS 4206 - Transition Prof Nurs Practicum \*\* Credit Hours: (4-8) \*

## Note

\*Accelerated students only may take approved courses concurrently.

The following represent a sample full-time schedule for RN students:

# RN (Upper Division Requirements)

## Senior Year

\*Statistics prior to nursing courses.

NURS 3005 - Intro Professional Nursing ** Credit Hours: (2)
NURS 3006 - Professional Nursing Seminar ** Credit Hours: (1)
NURS 3101 - Health Assessment ** Credit Hours: (2)
NURS 3103 - Health Assessment Lab Credit Hours: (1)
NURS 3400 - Clinical Pathophysiology ** Credit Hours: (3)
NURS 3000 - Pharmacology in Nursing ** Credit Hours: (3)
NURS 4127 - Community Health Nursing ** Credit Hours: (3)
NURS 4129 - Community HIth Nurs Practicum ** Credit Hours: (1)
NURS 4110 - Evidence Based Practice Nurs ** Credit Hours: (3)
NURS 4205 - Transition Professional Nurs ** Credit Hours: (4)
NURS 4206 - Transition Prof Nurs Practicum ** Credit Hours: (4-8)
UD elective (3)

#### Semester Totals 34 hrs

### Note

\* Take one of the following: EDPR 4541, PSYC 3001, or SOCI 3311, or any approved statistics course.

## Science Course Validation:

If seven years have lapsed since credit was earned in BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 (Anatomy and Physiology), or BIOL 1230/BIOL 1231 (Microbiology), the content is considered outdated, and students are required to either repeat the course(s) or validate currency of knowledge. Required validation of current science knowledge for RNs will occur through employer verification, repeating of course, taking a higher level science course in the same field, or obtaining a fiftieth (50th) percentile score or above on the NLN appropriate science test.

1102

# Nursing - Executive Leadership Concentration (Accelerated (RN-BSN-MSN)

# Accelerated Bachelor's And Master's (RN-BSN-MSN) Degree in Executive Leadership

This program is for registered nurses who do not have a bachelor's degree in nursing or another discipline or for those individuals with an associate degree or diploma in nursing.

MSN Executive Leadership ABM

# **Admission Requirements:**

The applicant must:

Be admitted to the U of M as a degree seeking RN-BSN-MSN student.

- Have a minimum college cumulative GPA of 2.8 complete Anatomy and Physiology I and II with lab and Microbiology with lab in seven (7) years of LCON admission with a grade of "C" or better.
- Have completed the following prerequisite courses with a grade of "C" or better (English Comp I and II, Intro to Sociology or General Psychology, Math, and Nutrition).

Have an active, unencumbered RN license, or be eligible for licensure.

- Be licensed in the state of TN or an approved state in which they will complete their clinical course work.
- Complete and submit an application for admission to the Loewenberg College of Nursing RN-BSN-MSN Program for students without a BA or BS degree.
- If transferring from another nursing program, applicants must submit a letter of good standing from the dean/director of the previous nursing program, along with a transcript, and meet LCON admission and progression standards as stated in the Undergraduate Catalog.

# **Progression and Retention Requirements:**

The student must:

- While in undergraduate level courses comply with all the retention standards of the University of Memphis as stated in the Undergraduate Catalog.
- While in graduate level courses comply with all retention and progression standards of the University of Memphis Graduate School.

Fulfill the general education requirements for the University of Memphis in order for BSN degree to be awarded.

Have a GPA of 2.8 or greater at the awarding of the BSN to successfully progress to the MSN program.

- Successfully complete the undergraduate nursing courses prior to entering the graduate level courses. The courses counting toward both the BSN and MSN degree must be taken prior to entering other graduate nursing courses, or taken concurrently with another graduate course in the semester the BSN is awarded.
- Follow the progression and retention requirements of both the LCON Graduate Program and University of Memphis Graduate School upon receiving the BSN and after entering the MSN portion of the program.
- Maintain a 3.0 GPA ("B"). Grades of "D" and "F" will not apply toward any graduate degree, but will be computed in the GPA. No more than 7 hours of "C-", "C," or "C+" will be applied towards meeting degree requirements.

# Accelerated Bachelor and Master (RN-BSN-MSN) Nursing with concentration in Executive Leadership

NURS 3000 - Pharmacology in Nursing \*\* Credit Hours: (3) NURS 3101 - Health Assessment \*\* Credit Hours: (2) NURS 3103 - Health Assessment Lab Credit Hours: (1) NURS 3400 - Clinical Pathophysiology \*\* Credit Hours: (3) NURS 4127 - Community Health Nursing \*\* Credit Hours: (3) NURS 4129 - Community Hith Nurs Practicum \*\* Credit Hours: (1) NURS 4205 - Transition Professional Nurs \*\* Credit Hours: (4) NURS 4206 - Transition Prof Nurs Practicum \*\* Credit Hours: (4-8) NURS 7007 - Adv Role Development for Nurse Executives \*\* \* (Counts for NURS3005/3006 \_Professional Nursing) NURS 7002 - Adv Nursing Research \*\* \* (Counts for NURS 4110 – Evidence Based Practice)

## The following courses are required for the MSN in Nursing Executive Leadership

NURS 7001 Health Care Policy
NURS 7901 Relationship Building for the Nurse Executive
NURS 7903 Accountability and Advocacy for Nurse Executives
NURS 7303 Healthcare Finance
NURS 7908 Healthcare Finance Practicum
NURS 7904 Fin Mgmt and Resource Allocation for Pt Care
NURS 7905 Improving Pt Care Delivery
NURS 7907 Evidenced Based Leadership Practices
NURS 7909 Nurse Executive Practicum
NURS 7909 - Scholarly Synthesis
Note: (\*courses count toward BSN and MSN degree) MSN degree to be awarded at the completion of

above.)

#### **Total Nursing Credits: 62 credits**

# School of Communication Sciences and Disorders

Linda D. Jarmulowicz, Ph.D., Dean 4055 North Park Loop Memphis, TN 38152 (901) 678-5800 https://www.memphis.edu/csd/

The School of Communication Sciences and Disorders offers several courses at the undergraduate level to introduce students to the professions of audiology and speech language pathology. These include topic areas such as communication sciences and disorders, autism, audiology, and neuroscience as well as several courses in American Sign Language. More information about these courses can be obtained by clicking on the following: Communication Sciences and Disorders Courses.

The University of Memphis does not offer an undergraduate degree in Communication Sciences and Disorders, but students interested in creating a undergraduate course plan that will prepare them with an appropriate background for applying to graduate school should be aware that a comprehensive background in science is strongly encouraged. Students should be sure to include courses during their undergraduate studies such as biology, physics, psychology, and math/statistics. More information about background courses for graduate degrees in Communication Sciences and Disorders can be found at www.asha.org and on the CSD website for speech-language pathology and audiology.

For more information, please email admissionscsd@memphis.edu.

# Helping people communicate.

Have you ever wondered what it would be like not to be able to communicate your thoughts, feelings, or ideas?

Communication is something many of us take for granted, but for the millions of individuals who have difficulty hearing, or those who have trouble speaking because they stutter or they have had a stroke, communication is not so simple.

The University of Memphis School of Communication Sciences and Disorders is nationally recognized for its academic, research, and clinical education programs for educating future audiologists, speech-language pathologists, and speech, language, or hearing scientists interested in helping individuals with such communication disorders.

The School offers a graduate-only curriculum leading to the AuD degree with a major in Audiology, the MA degree with a major in Speech-Language Pathology and the PhD degree with a major in Communication Sciences and Disorders with concentrations in Hearing Sciences and Disorders or Speech-Language Sciences and Disorders. The School has been consistently ranked among the best graduate programs by U.S. News and World Report every year since 1998.

# **American Sign Language Minor (18 hours)**

The School of Communication Sciences and Disorders offers a minor in American Sign Language (ASL). This program is for students in various disciplines across campus who are interested in learning and using ASL. The minor is intended to teach students the fundamentals of ASL as well as enrich students' knowledge of the Deaf and Deaf Culture.

A minimum of 18 credit hours is required. The minor requires 9 credit hours of introductory and intermediate ASL (AUSP 1010, 1020, and 2010), as well as 9 hours at the upper division level (3000 and 4000 level) with choices of courses focusing on fingerspelling; deaf culture and history; ASL for speech-language pathologists, audiologists, and educators; and psychological, sociological and educational perspectives of deafness.

Note: AUSP 2020 Inter Amer Sign Language II is available, but not required for the minor.

# Core Requirements for ASL (9 hours)

Required Courses:

AUSP 1010 - Intro Amer Sign Lang I Credit Hours: (3) AUSP 1020 - Intro Amer Sign Language II Credit Hours: (3)

## Upper Division Courses (9 hours)

Choose any three of the following courses:

- AUSP 3020 Advanced Fingerspelling Credit Hours: (3)
- AUSP 4106 Introduction to Audiology Credit Hours: (3)
- AUSP 4205 ASL for Speech, Audio, & Educ Credit Hours: (3)
- AUSP 4206 Deaf Culture and Deaf History Credit Hours: (3)
- AUSP 4207 Psychological, Sociological, and Educational Perspectives of Deafness Credit Hours: (3)
- AUSP 4208 Introduction to Interpreting ASL Credit Hours: (3)
- AUSP 4209 Linguistics in American Sign Language Credit Hours: (3)

# **College of Health Sciences**

Richard J. Bloomer, PhD, Dean 106 Roane Fieldhouse rbloomer@memphis.edu www.memphis.edu/CHS

The College of Health Sciences (CHS) provides students with a quality education focused on the fundamental principles of health, exercise, nutrition, and physical activity, while equipping them with the cutting-edge knowledge and skills needed to fulfill leadership roles in their chosen area of specialty. From introductory courses in health and wellness, to specialized courses in nutrition therapy, biomechanics, health sciences, exercise physiology, and physical education teacher education, students are taught to analyze and synthesize data, and to develop alternative approaches to problem solving. As a result, students are prepared to move rapidly upward in their chosen career path upon graduation, whether seeking employment or advanced graduate study.

Undergraduate degrees in CHS may prepare students for graduate work in a variety of settings (e.g., physical therapy, occupational therapy, physical education and recreation, strength and conditioning, medicine, physician assistant, dietetics and clinical nutrition, and more). Faculty members serve as mentors to students through laboratory and research activities, as well as through internships and study abroad opportunities. Five undergraduate and six graduate degree programs are currently offered within CHS. In addition, two graduate certificates are offered. A University-wide physical activity program is also coordinated through CHS.

# **Academic Programs**

Major: Health Studies (Concentrations in Dietetics; Exercise, Sport & Movement Sciences; Health Sciences; Healthcare Leadership)

Major: Physical Education Teacher Education

# Internships

For more information, including internship manual and application, please visit our **internship webpage**. Within the College of Health Sciences, undergraduate internship experiences are required and designed as culminating experiences that provide extensive, as well as intensive, hands-on work experience opportunities. The intern, while still a student, is expected to assume a responsible and comprehensive role that is commensurate with that of a full-time professional. Interns, in collaboration with their supervisors, are expected to establish objectives to be achieved during the internship experience. Credit hours assigned to internships range from 3 to 12 hours, depending on the requirements of various concentrations in the School.

Students enrolling in internship programs must complete prerequisites and program requirements in placements arranged by Dr. Dave Kean, CHS Coordinator of Internships, with the exception of Dietetics students who should contact Mary Catherine Schallert.

#### **Study Abroad Programs**

Most years, faculty members within the College of Health Sciences lead students on a study abroad expedition. Students receive course credit and greatly benefit from the overall experience. For information pertaining to the upcoming trip, please contact Ms. Kathy Walker.

For Additional Information, Application, and Scholarship Information: Click here.

Home CHS Research

# **Research Opportunities**

# **College of Health Sciences Research**

Faculty investigators within CHS are highly engaged in research within their respective disciplines. Some faculty are world-renown, developing and overseeing novel and focused research programs that command attention from investigators, clinicians, and other health specialists from around the world. Research within the CHS is funded through both internal and external sources, with faculty collectively securing hundreds of thousands of dollars annually to support their work.

1107

Due to the diversity of the academic disciplines within the CHS, several laboratories and supportive research areas exist, which provide resources to faculty and staff, as well as to graduate and undergraduate research assistants. Within and outside of the CHS, facilities are available to support cell culture studies, pre-clinical animal investigations (from rodent models), and human clinical investigations. Our current equipment inventory for laboratories within the CHS can be seen here.

Faculty investigators in the CHS are regularly seeking research participants. Please click here to see the current list of studies for which active recruitment is now taking place.

# **CHS Research Facilities**

Biochemistry and Molecular Biology Laboratory

Director: Marie van der Merwe, PhD

Bone Densitometry and Body Composition Laboratory

Director: Jacquelyn Pence, PhD

Cardiorespiratory/Metabolic Laboratory

Director: Richard J. Bloomer, PhD

Exercise Instructional Laboratory

Director: Lucas Baumgartner, MS

Musculoskeletal Analysis Laboratory

Director: Max Paquette, PhD

Motor Behavior Laboratory

Director: Yuhua Li, PhD

For more information, please visit the CHS Research website. In addition to the above facilities, which are directed by CHS faculty, several other research resources are available both on and off campus. For example, on-campus facilities such as The Integrated Microscopy Center (IMC) and The W. Harry Feinstone Center for Genomic Research are available to support faculty research. Off-campus opportunities for collaboration are multiple, with investigators at The University of TN Health Science Center, LeBonheur Children's Hospital, and St. Jude Children's Research Hospital, in addition to various medical device companies within the Memphis area.

# **Major: Health Studies**

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# Health Studies - Dietetics Concentration (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## Note:

As part of the University General Education Program requirements, Dietetics concentration must take the following courses:

#### **Natural Science**

CHEM 1110 - General Chemistry I CHEM 1111 - General Chemistry I Lab CHEM 1120 - General Chemistry II CHEM 1121 - General Chemistry II Lab

#### Social/Behavioral Sciences:

PSYC 1030 CDFS 2101 OR SOCI 1010 OR ANTH 1200

## The Major (11 hours)

BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) NUTR 2202 - Nutrition \*\* Credit Hours: (3)

# Dietetics (63 hours):

NUTR 2102 - Intro to Dietetics Credit Hours: (2) NUTR 2302 - Introduction to Culinary Nutrition Credit Hours: (3) NUTR 2303 - Intro to Culinary Laboratory Credit Hours: (1) HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2) NUTR 3002 - Advanced Human Metabolism I Credit Hours: (3) NUTR 4010 - Management and Food Systems Credit Hours: (3) NUTR 4000 - Senior Seminar in Dietetics Credit Hours: (1) NUTR 4102 - Medical Nutrition Therapy I Credit Hours: (3) NUTR 4112 - Medical Nutrition Therapy II Credit Hours: (3) NUTR 4602 - Community Nutrition Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php NUTR 4802 - Experimental Foods Credit Hours: (3) NUTR 4803 - Experimental Foods Laboratory Credit Hours: (1) NUTR 4812 - Adv Human Metabolism II Credit Hours: (3) HMSE 4999 - Senior Project/HSS \*\* Credit Hours: (3) BIOL 1230 - Microbiology \*\* Credit Hours: (3) BIOL 1231 - Microbiology Lab \*\* Credit Hours: (1) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) HLSC 4400 - Statistics for Health Sciences Credit Hours: (3) NUTR 4605 - Internship Credit Hours: (3)

# Electives (5 hours)

Selected in consultation with advsor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

## Typical 4-Year Dietetics Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Mathematics (3) \* History (3) \* Humanities/Fine Arts (3) \* CHEM 1110 - General Chemistry I Credit Hours: (3) CHEM 1111 - General Chemistry I Lab Credit Hours: (1) ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* PSYC 1030 - General Psychology\*\* Credit Hours: (3) History (3) \* CHEM 1120 - General Chemistry II Credit Hours: (3) CHEM 1121 - General Chemistry II Credit Hours: (1)

Year Total 32 hrs

#### Sophomore Year

ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 NUTR 2102 - Intro to Dietetics Credit Hours: (2) NUTR 2202 - Nutrition \*\* Credit Hours: (3) NUTR 2302 - Introduction to Culinary Nutrition Credit Hours: (3) NUTR 2303 - Intro to Culinary Laboratory Credit Hours: (1) BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) COMM 2381 - Oral Communication \*\* Credit Hours: (3) SOCI 1010 - Introduction to Sociology \*\* Credit Hours: (3) ACCT 2010 - Fundamentals of Acct I \*\* Credit Hours: (3) HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2)

BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3)

#### Year Total 31 hrs

#### Junior Year

BIOL 1230 - Microbiology \*\* Credit Hours: (3) BIOL 1231 - Microbiology Lab \*\* Credit Hours: (1) MKTG 3010 - Principles of Marketing \*\* Credit Hours: (3) CHEM 3310 - Foundations/Organic Chemistry Credit Hours: (3) CHEM 3301 - Foundations/Organic Chem Lab Credit Hours: (1) NUTR 3002 - Advanced Human Metabolism I Credit Hours: (3) NUTR 4010 - Management and Food Systems Credit Hours: (3) HLSC 4400 - Statistics for Health Sciences Credit Hours: (3) HLSC 4520 - Health and Lifestyle Counseling Credit Hours: (3) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3)

Year Total 29 hrs

### Senior Year

NUTR 4102 - Medical Nutrition Therapy I Credit Hours: (3) NUTR 4802 - Experimental Foods Credit Hours: (3) NUTR 4803 - Experimental Foods Laboratory Credit Hours: (1) NUTR 4812 - Adv Human Metabolism II Credit Hours: (3) MGMT 3110 - Organization and Mgmt \*\* Credit Hours: (3) NUTR 4000 - Senior Seminar in Dietetics Credit Hours: (1)

NUTR 4112 - Medical Nutrition Therapy II Credit Hours: (3) Elective (2) NUTR 4602 - Community Nutrition Credit Hours: (3) NUTR 4605 - Internship Credit Hours: (3) HMSE 4999 - Senior Project/HSS \*\* Credit Hours: (3)

Year Total 28 hrs

Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Dietetics Concentration - M.S. Nutrition - Clinical Nutrition Concentration, (Accelerated B.S./M.S.)

# An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences:

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/MS, Nutrition (NUTR) with a concentration in Clinical Nutrition (CLNN).

The Accelerated Bachelor's/Master's (ABM) degree program HS DIET/ NUTR (CLNN) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be

subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in CLNN that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

1111

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/Dietetics bachelor's and NUTR/ CLNN master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;

Have a UM GPA of 3.25 or better

Be within 40 semester hours of graduation

- Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;
- Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and Apply for admission to the ABM Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

## Nutrition with a concentration in Clinical Nutrition:

NUTR 6010 - Management and Food Systems NUTR 7412 – Cellular Nutrition I NUTR 7422 – Cellular Nutrition II HPRO 7780 – Health Counseling

# Health Studies - Dietetics Concentration - M.S. Nutrition - Environmental Nutrition Concentration, (Accelerated B.S./M.S.)

# An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences:

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/ MS, Nutrition (NUTR) with a concentration in Environmental Nutrition (ENVN)

The Accelerated Bachelor's/Master's (ABM) degree program HS (DIET)/ NUTR (ENVN) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in ENVN that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/DIET bachelor's and NUTR/ENVN master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;

- Have a UM GPA of 3.25 or better
- Be within 40 semester hours of graduation
- Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;

Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and Apply for admission to the ABM Degree Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

## Nutrition with a concentration in Environmental Nutrition:

NUTR 7182 Environmental Nutrition NUTR 7712 Cultural Foods and Nutrition HMSE 7010 Research Methods in Health Studies

# Health Studies - Dietetics Concentration - M.S. Nutrition - Nutrition Science, (Accelerated B.S./M.S.)

# An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences:

BS, Health Studies (HS) with a concentration in Dietetics (DIET)/ MS, Nutrition (NUTR) with a concentration in Nutrition Science (NS)

The Accelerated Bachelor's/Master's (ABM) degree program HS DIET/ NUTR (NS) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in DIET that also may be subsequently applied on a prearranged basis to the master's degree in NUTR with a concentration in NS that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/Dietetics bachelor's and NUTR/NS master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program;

Have a UM GPA of 3.25 or better

Be within 40 semester hours of graduation

Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;

Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and Apply for admission to the ABM Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which school-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

NUTR 7412 – Cellular Nutrition I NUTR 7422 – Cellular Nutrition II HMSE 7010 - Research Methods in HS ESMS 7020 - Pub/Prop in Health & Biomed

# Health Studies - Exercise, Sport & Movement Sciences Concentration (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

Students must complete all major and concentration requirements with a C- or better to be eligible to enroll in their internship.

# University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

## Note:

Exercise, Sport & Movement Sciences concentration may take any two of the following General Education natural sciences courses with lab in addition to BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021: BIOL 1010/BIOL 1011 (4); BIOL 1020/BIOL 1021 (4); BIOL 1110/BIOL 1111 (4); BIOL 1120/BIOL 1121 (4); CHEM 1010/CHEM 1011 (4); CHEM 1020/CHEM 1021 (4); CHEM 1110/CHEM 1111 (4); CHEM 1120/CHEM 1121 (4); PHYS 1010/PHYS 1001 (4); PHYS 2110/PHYS 2111 (4); PHYS 2120/PHYS 2121 (4).

## The Major (11 hours)

BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) NUTR 2202 - Nutrition \*\* Credit Hours: (3)

## Exercise, Sport & Movement Sciences (50 hours):

HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2)

- ESMS 2004 Intro to Exercise Science Credit Hours: (3)
- ESMS 2015 Resistance/Aerobic Training Applications Credit Hours: (3)

Must pass BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021, HMSE 2000, ESMS 2004, & ESMS 2015 with minimum grade C- to register for upper division ESMS courses

ESMS 3020 - Exercise and Sport Mechanics Credit Hours: (3)

- ESMS 3050 Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3)
- ESMS 3410 Anatomical Kinesiology | Credit Hours: (3)
- ESMS 3415 Anatomical Kinesiology II Credit Hours: (3)
- ESMS 3450 Psychological Aspects of Exercise Credit Hours: (3)

ESMS 3603 - Exercise Physiology I Credit Hours: (3) ESMS 3703 - Exercise Physiology II Credit Hours: (3) ESMS 3803 - Motor Learning Credit Hours: (3) ESMS 4000 - Exercise Testing Interpretation Lab Credit Hours: (3) ESMS 4015 - Exercise Programs for Special Populations Credit Hours: (3) ESMS 4603 - Adv Meth/Strength Conditioning Credit Hours: (3) HLSC 4400 - Statistics for Health Sciences Credit Hours: (3) ESMS 4605 - Internship Credit Hours: (3-6)

# Electives (18 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. Guided Electives.

In some of the above courses, variable hours of supervised laboratory/field experience will be required.

## Typical 4-Year Exercise, Sport, & Movement Sciences Concentration Sequence

## Freshman Year

ENGL 1010 - English Composition\*\* Credit Hours: (3) Humanities/Fine Arts (3) \* Mathematics (3) \* Social/Behavioral Sciences (3) \* Natural Sciences (4) \*

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) History (3)\* Natural Sciences (4)\* Social/Behavioral Sciences (3)\* Humanities/Fine Arts (3)\*

#### Year Total 32 hrs

#### Sophomore Year

```
History (3) *
BIOL 2010 - Anatomy/Physiology I** Credit Hours: (3)
BIOL 2011 - Anat/Physiology I Lab ** Credit Hours: (1)
ESMS 2004 - Intro to Exercise Science Credit Hours: (3)
ENGL 2201 - Literary Heritage ** Credit Hours: (3) OR ENGL 2202
NUTR 2202 - Nutrition ** Credit Hours: (3)
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
COMM 2381 - Oral Communication ** Credit Hours: (3)
Elective (3)
ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3)
HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2)
```

Year Total 28 hrs

#### Junior Year

ESMS 3050 - Advanced Life Support Exercise, Conditioning, Testing Credit Hours: (3) ESMS 3410 - Anatomical Kinesiology | Credit Hours: (3) ESMS 3415 - Anatomical Kinesiology II Credit Hours: (3) ESMS 3703 - Exercise Physiology II Credit Hours: (3) ESMS 3803 - Motor Learning Credit Hours: (3) Elective (3) ESMS 3450 - Psychological Aspects of Exercise Credit Hours: (3) ESMS 3603 - Exercise Physiology I Credit Hours: (3) ESMS 3020 - Exercise and Sport Mechanics Credit Hours: (3) Elective (3)

Year Total 33 hrs

## Senior Year

ESMS 4000 - Exercise Testing Interpretation Lab **Credit Hours:** (3) ESMS 4015 - Exercise Programs for Special Populations **Credit Hours:** (3) ESMS 4603 - Adv Meth/Strength Conditioning **Credit Hours:** (3) HLSC 4400 - Statistics for Health Sciences **Credit Hours:** (3) Elective (3) \* ESMS 4605 - Internship **Credit Hours:** (3-6) (6) Elective (3)

Elective (3)

Year Total 27 hrs

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

# Health Studies - Exercise, Sport & Movement Sciences Concentration - M.S. Health Studies - Exercise, Sport & Movement Sciences Concentration, (Accelerated B.S./M.S.)

An Accelerated Bachelor's/Master's (ABM) Program is offered by the College of Health Sciences: BS, Health Studies (HS) with a concentration in Exercise, Sport and Movement Sciences (ESMS)/ MS, Health Studies (HS) with a concentration in Exercise, Sport and Movement Science (ESMS)

The Accelerated Bachelor's/Master's (ABM) degree program HS (ESMS)/ HS (ESMS) provides qualified UM selected undergraduate students the opportunity to satisfy course requirements, including elective hours, for the bachelor's degree in HS with a concentration in ESMS that also may be subsequently applied on a prearranged basis to the master's degree in HS with a concentration in ESMS that may satisfy some of its degree requirements.

For students who work closely with their advisors in planning their course of study in the College of Health Sciences, this option offers the opportunity of simultaneously satisfying partial degree requirements for a bachelor's and a master's degree in an accelerated program of study. Upon completion of the undergraduate degree with a satisfactory undergraduate grade point average and a grade of "B" or better in all graduate courses completed, the student may move to full graduate student status, and the preapproved graduate courses taken as an undergraduate may be applied toward the pre-specified graduate program of study.

Students may use up to 12 credit hours of designated courses in meeting the requirements of both the HS/ESMS bachelor's and HS/ESMS master's degrees. Courses considered for this purpose may include 4000/6000-level cognates and/or 7000-level courses. Undergraduate students will register for the 6000- or 7000-level courses, but fees will be levied at the undergraduate rate. Students applying for this program must:

Have completed at least 18 hours of course work at UM before taking courses as part of the ABM program; Have a UM GPA of 3.25 or better

Be within 40 semester hours of graduation

Have written approval of the program coordinator(s) of both the respective undergraduate and graduate programs, the CHS Assistant Director of Student Services, and the CHS Director of Academic Programs for specific graduate courses to be acceptable for dual credit in the undergraduate and master's degree programs;

Meet all requirements for admission into the specified graduate program (except for the GRE and completion of the undergraduate degree); and Apply for admission to the ABM Degree Program including all necessary admissions documentation to the Graduate School by the deadline dates listed below.

A maximum total of 12 semester hours of preapproved graduate coursework may be considered for dual credit in the undergraduate and graduate degree programs and a maximum total academic load of 15 hours during the semester in which any of the graduate courses are taken.

Students interested in this option must meet in person with the program coordinator(s) for respective undergraduate and graduate programs in question, the CHS Assistant Director of Student Services, as well as the CHS Director of Academic Programs, and receive their written approval of the application. Final acceptance into the ABM program is contingent upon approval by the Dean of the Graduate School. Approvals apply only for the specific programs and courses designated in the application. Stipulated graduate courses for the ABM program are the only ones for which students in the undergraduate program are eligible to enroll, and completion of all allowable graduate courses is optional.

For application materials, contact the CHS Assistant Director of Student Services at 901-678-5037 or go to

www.memphis.edu/CHS/students/admission\_advising.php. Submit application materials to the College of Health Sciences no later than the following dates for optimal admission consideration, after which CHS-approved applications will be submitted by the school to the Graduate School for consideration:

April 15 for fall term admission

October 15 for spring term admission

April 15 for summer term admission

Subsequent to admission into the ABM program and satisfactory completion of stipulated coursework approved for the designated programs of study, a maximum of 12 credit hours from the following graduate courses may be applied to the respective programs of study for both the undergraduate and graduate levels as follows:

ESMS 6000 - Exer Test Interp Lab or ESMS 6603 - Adv Meth Strength Cond ESMS 7010 - Research Methods in HS ESMS 7020 - Pub/Prop in Health & Biomed ESMS 7800 - Internship in ESMS

# Health Studies - Health Sciences Concentration, (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

Students must complete all major and concentration requirements with a C- or better to be eligible to enroll in their internship.

# University General Education Program (33 hours)

See University General Education Program for University General Education Program requirements. Note the following requirements are specified for this program:

#### Natural Science

Natural Science requirements are fulfilled by BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 as part of the major core for Health Sciences and Healthcare Leadership concentrations.

#### Note:

Health Sciences concentration must take:

```
Social/Behavioral Science:
PSYC 1030 - General Psychology** Credit Hours: (3)
```

# The Major (11 hours)

```
BIOL 2010 - Anatomy/Physiology I** Credit Hours: (3)
BIOL 2011 - Anat/Physiology I Lab ** Credit Hours: (1)
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
NUTR 2202 - Nutrition ** Credit Hours: (3)
```

### Health Sciences (36 hours):

HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3) HLSC 3505 - Prin/Health Fitness Instruc Credit Hours: (3) HLSC 3522 - Assessment and Program Evaluation in Health Sciences (HSCI) Credit Hours: (3) HLSC 3606 - Leadership and Communication in Health Sciences Credit Hours: (3) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) HLSC 3800 - Strategic Planning & Program Development Credit Hours: (3) HLSC 4500 - Project Management in Health Sciences Credit Hours: (3) HLSC 4520 - Health and Lifestyle Counseling Credit Hours: (3) HLSC 4530 - Epidemiology \*\* Credit Hours: (3) HLSC 4605 - Internship Credit Hours: (6-9)

# Electives (40 - 43 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

# Typical 4-Year Health Sciences Concentration Sequence

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Humanities (3) *
Mathematics (3) *
History (3) *
Elective (3)
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
PSYC 1030 - General Psychology** Credit Hours: (3)
HLSC 2100 - Wellness Concepts Practice** Credit Hours: (3)
Humanities (3)*
Elective (3)
```

#### Year Total 30 hrs

#### Sophomore Year

```
History (3) *
BIOL 2010 - Anatomy/Physiology I** Credit Hours: (3)
BIOL 2011 - Anat/Physiology I Lab ** Credit Hours: (1)
Social/Behavioral Science (3) *
ENGL 2201 - Literary Heritage ** Credit Hours: (3) OR ENGL 2202
NUTR 2202 - Nutrition ** Credit Hours: (3)
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
COMM 2381 - Oral Communication ** Credit Hours: (3)
HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3)
Elective (3)
Elective (3)
```

Year Total 32 hrs

#### Junior Year

HLSC 3522 - Assessment and Program Evaluation in Health Sciences (HSCI) Credit Hours: (3)
HLSC 3800 - Strategic Planning & Program Development Credit Hours: (3)
HLSC 3505 - Prin/Health Fitness Instruc Credit Hours: (3)
Elective (3)
Elective (3)
ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3)
HLSC 3606 - Leadership and Communication in Health Sciences Credit Hours: (3)
HLSC 3606 - Leadership and Lifectule Commenciation (2)

HLSC 4520 - Health and Lifestyle Counseling Credit Hours: (3)

Elective (3)

Elective (3)

#### Year Total 30 hrs

#### Senior Year

```
HLSC 4500 - Project Management in Health Sciences Credit Hours: (3)
HLSC 4530 - Epidemiology ** Credit Hours: (3)
Elective (3)
Elective (3)
Elective (3)
```

```
HLSC 4605 - Internship Credit Hours: (6-9)
Elective (3)
Elective (4)
```

Year Total 28 hrs

Total Hours: 120

### Total Hours Required for Graduation: 120

\*\* Must show proof of current First Aid and CPR certification before Internship.

# Health Studies - Healthcare Leadership Concentration, (B.S.)

# Health Studies (B.S.)

Program objectives for a B.S. in Health Studies are: (a) to demonstrate critical thinking skills, specifically in the areas of evaluating evidence and understanding sources; (b) to demonstrate proficiency in written and oral communication and computer utilization; (c) to use knowledge of functional anatomy and biomechanics to analyze and evaluate movement and to prescribe exercises to prevent injuries and enhance performance; (d) to recognize risk factors (i.e., cardiovascular, metabolic, musculoskeletal) and their relationship to physical activity, nutrition and other lifestyle behaviors; identify risk factors, which may require consultation with medical or allied health professionals (e) to demonstrate an understanding of principles and research-based guidelines for nutrition, body composition, and weight management when analyzing current status and prescribing desirable changes; (f) to demonstrate understanding of the basic principles of program planning, management, evaluation, and administration of health and wellness programs and facilities.

# University General Education Program (33 hours)

See University General Education Program for University General Education Program requirements. Note the following requirements are specified for this program:

#### **Natural Science**

Natural Science requirements are fulfilled by BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021 as part of the major core for Health Sciences and Healthcare Leadership concentrations.

#### The Major (11 hours)

BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) BIOL 2020 - Anatomy/Physiology II\*\* Credit Hours: (3) BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) NUTR 2202 - Nutrition \*\* Credit Hours: (3)

#### Healthcare Leadership (47 hours):

HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2) HCL 3000 - Healthcare Leadership \*\* Credit Hours: (3) HCL 3010 - Healthcare Financial Mgmt \*\* Credit Hours: (3) HCL 3020 - Healthcare Informatics \*\* Credit Hours: (3) HCL 3030 - Healthcare Strategic Plan/Mktg \*\* Credit Hours: (3) HCL 3040 - U S Health System \*\* Credit Hours: (3) HCL 3050 - Prof Writing Healthcare \*\* Credit Hours: (3) COMM 3012 - Health Communication \*\* Credit Hours: (3) HCL 4000 - Health Policy Issues \*\* Credit Hours: (3) HCL 4010 - Healthcare Stats/Research \*\* Credit Hours: (3) HCL 4020 - Law/Ethics of Healthcare \*\* Credit Hours: (3) HCL 4030 - Healthcare Human Resources \*\* Credit Hours: (3) HCL 4040 - Business Principles/Healthcare \*\* Credit Hours: (3) HLSC 4530 - Epidemiology \*\* Credit Hours: (3) HCL 4605 - Internship \*\* Credit Hours: (3-

#### Electives (29-32 hours)

In some of the above courses, variable hours of supervised laboratory/field experience will be required.

### Typical 4-Year Healthcare Leadership Concentration Sequence

#### Freshman Year

```
ENGL 1010 - English Composition** Credit Hours: (3)
Mathematics (3) *
Humanities/Fine Arts (3) *
Social/Behavioral Sciences (3) *
Elective (3)
```

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
Humanities/Fine Arts (3) *
HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2)
NUTR 2202 - Nutrition ** Credit Hours: (3)
Elective (3)
```

Year Total 29 hrs

#### Sophomore Year

```
BIOL 2010 - Anatomy/Physiology I** Credit Hours: (3)
BIOL 2011 - Anat/Physiology I Lab ** Credit Hours: (1)
Elective (3) *
History (3) *
Social/Behavioral Sciences (3) *
ENGL 2201 - Literary Heritage ** Credit Hours: (3) OR ENGL 2202
```

```
BIOL 2020 - Anatomy/Physiology II** Credit Hours: (3)
BIOL 2021 - Anat/Physiology II Lab ** Credit Hours: (1)
History (3) *
Elective (3)
Elective (3)
COMM 2381 - Oral Communication ** Credit Hours: (3)
```

Year Total 32 hrs

#### Junior Year

```
HCL 3000 - Healthcare Leadership ** Credit Hours: (3)
HCL 3030 - Healthcare Strategic Plan/Mktg ** Credit Hours: (3)
HCL 3040 - U S Health System ** Credit Hours: (3)
HCL 3050 - Prof Writing Healthcare ** Credit Hours: (3)
Elective (3)
HCL 3010 - Healthcare Financial Mgmt ** Credit Hours: (3)
HCL 3020 - Healthcare Informatics ** Credit Hours: (3)
HCL 4000 - Health Policy Issues ** Credit Hours: (3)
HCL 4020 - Law/Ethics of Healthcare ** Credit Hours: (3)
HCL 4030 - Healthcare Human Resources ** Credit Hours: (3)
```

#### Year Total 30 hrs

#### Senior Year

```
HCL 4010 - Healthcare Stats/Research ** Credit Hours: (3)
HCL 4040 - Business Principles/Healthcare ** Credit Hours: (3)
HLSC 4530 - Epidemiology ** Credit Hours: (3)
COMM 3012 - Health Communication ** Credit Hours: (3)
Elective (2)
HCL 4605 - Internship ** Credit Hours: (3-6)
Elective (3)
Elective (3)
Elective (3)
```

Year Total 29 hrs

# Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\*Internship is for 6 hours unless student has five years or more in a healthcare occupation, then for 3 hours.

# **Medical Assisting Minor**

The College of Health Sciences offers a 24-credit hour minor available to students across campus. The minor is intended to enrich students' current plan of study and provide an opportunity to learn valuable skills applicable in the clinical setting. Coursework in the Medical Assisting minor allows students to obtain the necessary knowledge and practical skills needed to sit for the national certification exam in Medical Assisting. If students do not desire to obtain a certificate, the coursework should be helpful if they choose to pursue other entry-level healthcare positions for which such knowledge and skills may be desired.

Students seeking part-time employment as a medical assistant while completing their undergraduate degree may be interested in this minor, while those students who plan to apply to graduate programs requiring patient contact hours prior to acceptance may also be interested. The knowledge and skills gained through the minor coursework may allow students to be more marketable for entry-level healthcare employment opportunities.

# Medical Assisting Minor (24 Hours)

BIOL 2010 - Anatomy/Physiology I\*\* Credit Hours: (3) BIOL 2011 - Anat/Physiology I Lab \*\* Credit Hours: (1) BIOL 2020 - Anatomy/Physiology II \*\* Credit Hours: (3) BIOL 2021 - Anat/Physiology II Lab \*\* Credit Hours: (1) HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2) HLSC 3000 - Introduction to Medical Assisting Credit Hours: (3) HLSC 3001 - Laboratory Techniques in Medical Assisting Credit Hours: (4) HLSC 3002 - Patient Interaction in Medical Assisting Credit Hours: (3) HLSC 3003 - Medical Office Administration Credit Hours: (3) HLSC 3004 - Medical Assisting Certification Review Preparation Credit Hours: (1)

# Nutrition, Health & Wellness Minor

The minor is intended to enrich students' current plan of study and provide an opportunity to learn valuable skills and information applicable within healthcare settings. All students interested in pursuing this minor will be allowed to do so.

Completion of 18 semester hours with a minimum grade of C including NUTR 2202, HLSC 2100, either ESMS 2015 or HMSE 2000 and HMSE 2007, and 9 credit hours of electives from the groups listed below.

# Required (6 hours)

HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) NUTR 2202 - Nutrition \*\* Credit Hours: (3)

#### Choose from the following (3 hours)

ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) OR HMSE 2000 - Health/Sport Sc Terminology Credit Hours: (2) AND HMSE 2007 - Careers in Health Studies Credit Hours: (1)

#### 9 additional credit hours

Students must choose 9 credit hours of electives from the following groups:

Upper-division hours in ESMS\*\*

Upper-division hours in PETE\*\*

Upper-division hours in HCL\*\*

Upper-division hours in NUTR\*\*

Upper-division hours in HMSE\*\*

Upper-division hours in HLSC\*\*

\*\*Students majoring in a College of Health Sciences program of study must take courses outside of their current concentration to satisfy the 9 credithour elective requirement

# **Major: Physical Education Teacher Education**

Program objectives for a B.S.Ed. in Physical Education Teacher Education are: (a) to identify critical elements of motor skill performance, and combine motor skills into appropriate sequences for the purpose of improving learning; (b) to demonstrate competent motor skill performance in a variety of physical activities; (c) to describe performance concepts and strategies related to skillful movement and physical activity (e.g., fitness principles, game tactics, skill improvement principles); (d) to describe and apply bioscience (anatomical, physiological, and biomechanical) and psychological concepts to skillful movement, physical activity, and fitness; (e) to understand and debate current physical education/activity issues and laws based on historical, philosophical, and sociological perspectives; (f) to demonstrate knowledge of approved state and national content standards and local program goals in schools and community settings.

# Physical Education Teacher Education - School Concentration, (B.S.Ed.)

# **Physical Education Teacher Education - School Concentration, (B.S.Ed.)**

Program objectives for a B.S.Ed. in Physical Education Teacher Education are: (a) to identify critical elements of motor skill performance, and combine motor skills into appropriate sequences for the purpose of improving learning; (b) to demonstrate competent motor skill performance in a variety of physical activities; (c) to describe performance concepts and strategies related to skillful movement and physical activity (e.g., fitness principles, game tactics, skill improvement principles); (d) to describe and apply bioscience (anatomical, physiological, and biomechanical) and psychological concepts to skillful movement, physical activity, and fitness; (e) to understand and debate current physical education/activity issues and laws based on historical, philosophical, and sociological perspectives; (f) to demonstrate knowledge of approved state and national content standards and local program goals in schools and community settings.

\*Note: The School Concentration is a Licensure track concentration. In order for the School concentration to result in Residency and teacher licensure, student must be admitted to the Teacher Education Program (TEP).

1124

### University General Education Program (41 hours)

See Graduation from the University for the University General Education Program requirements.

#### The Major (39 hours)

EDPR 2111 - Development Across Lifespan Credit Hours: (3) ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) ESMS 3853 - Motor Behavior Credit Hours: (3) PETE 2000 - Introduction to PETE Credit Hours: (3) PETE 2001 - Individual Fitness Teaching Credit Hours: (3) PETE 2002 - Ed Games/Team Sport Skill Credit Hours: (3) PETE 2003 - Skill Competence in Individual Sports Credit Hours: (3) PETE 2010 - Educational Dance and Gymnastics Credit Hours: (3) PETE 3307 - Psychosocial Aspect of Sport\*\* Credit Hours: (3) PETE 3308 - Exceptional Learner Phys Ed Credit Hours: (3)

#### School Physical Education Concentration (40 hours)

HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3)

ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3)

IDT 3600 - Technology in Education Credit Hours: (3)

PETE 4201 - Curr/Integ Learn/EI PE Well Credit Hours: (3)

PETE 4301 - Curr/Integ Learn/Sec PE/Well Credit Hours: (3)

PETE 4401 - Learner Assessment PE/Well Credit Hours: (3)

PETE 4501 - Residency I Practicum PE/Well Credit Hours: (5)

PETE 4601 - Residency II Seminar PE/Well Credit Hours: (3)

PETE 4701 - Residency II Practicum PE/Well Credit Hours: (9)

PHED 1722 - Swim-Lifeguarding Credit Hours: (2) OR

PHED 1713 - Intermediate Swim Credit Hours: (2) OR

PHED 2703 - Teaching Swimming and WSI Credit Hours: (3) Choose 1 Coaching Elective:

PETE 3400 - Coaching Team/Individual Sports Credit Hours: (3) OR

PETE 3450 - Motivation in Athletics and Coaching Credit Hours: (3) OR

PETE 3500 - Sports Performance Training for Coaches Credit Hours: (3) OR

PETE 3550 - Sports Officiating Techniques Credit Hours: (3)

PETE 3600 - Sport Coaching Administration and Leadership Credit Hours: (3)

### Typical 4-Year Physical Education Teacher Education (School Concentration) Sequence

#### Freshman Year

OR

**First Semester** 

ENGL 1010 - English Composition\*\* Credit Hours: (3) Natural Science (4) \* Mathematics (3) \* Social/Behavioral Sciences (3) \* Humanities/Fine Arts (3) \*

#### Second Semester

```
ENGL 1020 - English Comp/Analysis** Credit Hours: (3)
PSYC 1030 - General Psychology** Credit Hours: (3)
Natural Science (4) *
History (3) *
Humanities (3) *
```

Year Totals : 32 Hours

#### Sophomore Year

#### **First Semester**

HLSC 2100 - Wellness Concepts Practice\*\* Credit Hours: (3) PETE 2000 - Introduction to PETE Credit Hours: (3) PETE 2001 - Individual Fitness Teaching Credit Hours: (3) PETE 2003 - Skill Competence in Individual Sports Credit Hours: (3) History (3)\*

#### Second Semester

EDPR 2111 - Development Across Lifespan Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) PETE 2002 - Ed Games/Team Sport Skill Credit Hours: (3) PETE 2010 - Educational Dance and Gymnastics Credit Hours: (3)

Year Totals : 30 Hours

Junior Year

#### **First Semester**

COMM 2381 - Oral Communication \*\* Credit Hours: (3) ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3) ICL 3333 - Stdnt Assess/Inst Dec Mkng Credit Hours: (3) IDT 3600 - Technology in Education Credit Hours: (3) PETE 3307 - Psychosocial Aspect of Sport\*\* Credit Hours: (3) PHED 1713 - Intermediate Swim Credit Hours: (2) \*\*

#### Second Semester

ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) ESMS 3853 - Motor Behavior Credit Hours: (3) PETE 3308 - Exceptional Learner Phys Ed Credit Hours: (3) PETE 3800 - Instr Strategies Phys Ed Credit Hours: (3)

#### Year Totals : 32 Hours

#### Senior Year

#### **First Semester**

PETE 4201 - Curr/Integ Learn/EI PE Well Credit Hours: (3) PETE 4301 - Curr/Integ Learn/Sec PE/Well Credit Hours: (3) PETE 4401 - Learner Assessment PE/Well Credit Hours: (3) PETE 4501 - Residency I Practicum PE/Well Credit Hours: (5)

#### Second Semester

PETE 4601 - Residency II Seminar PE/Well Credit Hours: (3) PETE 4701 - Residency II Practicum PE/Well Credit Hours: (9)

Year Totals : 26 Hours

#### Total Hours Required for Graduation: 120

\*Must satisfy University General Education Program Requirement

\*\* Swimming credit can be substituted with advanced courses in swimming. CPR Certification required for Student Teaching. Course not required but advised.

# **Physical Education Teacher Education - Sport Coaching Concentration** (**B.S.Ed.**)

# **Physical Education Teacher Education - Sport Coaching Concentration, (B.S.Ed.)**

Program objectives for a B.S.Ed. in Physical Education Teacher Education are: (a) to identify critical elements of motor skill performance, and combine motor skills into appropriate sequences for the purpose of improving learning; (b) to demonstrate competent motor skill performance in a variety of physical activities; (c) to describe performance concepts and strategies related to skillful movement and physical activity (e.g., fitness principles, game tactics, skill improvement principles); (d) to describe and apply bioscience (anatomical, physiological, and biomechanical) and psychological concepts to skillful movement, physical activity, and fitness; (e) to understand and debate current physical education/activity issues and laws based on historical, philosophical, and sociological perspectives; (f) to demonstrate knowledge of approved state and national content standards and local program goals in schools and coaching settings.

\*Note: the Sport Coaching concentration does NOT result in licensure.

# University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

# The Major (33 hours)

EDPR 2111 - Development Across Lifespan Credit Hours: (3)

ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3) ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) ESMS 3853 - Motor Behavior Credit Hours: (3) PETE 2000 - Introduction to PETE Credit Hours: (3) PETE 3307 - Psychosocial Aspect of Sport\*\* Credit Hours: (3) PETE 3308 - Exceptional Learner Phys Ed Credit Hours: (3) PETE 3800 - Instr Strategies Phys Ed Credit Hours: (3) PETE 2001 - Individual Fitness Teaching Credit Hours: (3) PETE 2002 - Ed Games/Team Sport Skill Credit Hours: (3) PETE 2003 - Skill Competence in Individual Sports Credit Hours: (3)

### Sport Coaching Concentration (24 hours)

ESMS 3502 - Prevention/Care of Athletic Injuries Credit Hours: (3)

PETE 2010 - Educational Dance and Gymnastics Credit Hours: (3)

PETE 3400 - Coaching Team/Individual Sports Credit Hours: (3)

PETE 3450 - Motivation in Athletics and Coaching Credit Hours: (3)

PETE 3500 - Sports Performance Training for Coaches Credit Hours: (3)

PETE 3550 - Sports Officiating Techniques Credit Hours: (3)

PETE 3600 - Sport Coaching Administration and Leadership Credit Hours: (3)

PETE 4605 - Internship Credit Hours: (3-9)

### Electives (22 hours)

Selected in consultation with advisor to bring the total number of credit hours to 120. In some of the above courses, variable hours of supervised laboratory/field experience will be required.

# Typical 4-Year Physical Education Teacher Education (Sport Coaching) Sequence

#### Freshman Year

#### **First Semester**

ENGL 1010 - English Composition\*\* Credit Hours: (3) Natural Science (4)\* Mathematics (3)\* Social/Behavioral Sciences (3)\* Humanities (3)\*

#### Second Semester

ENGL 1020 - English Comp/Analysis\*\* Credit Hours: (3) PSYC 1030 - General Psychology\*\* Credit Hours: (3) Natural Science (4)\* History (3)\* Humanities (3)\*

Year Totals : 32 hours

#### Sophomore Year

**First Semester** 

PETE 2000 - Introduction to PETE Credit Hours: (3) History (3)\* PETE Concentration (3)\*\* Coaching Concentration (3)\*\*\* Elective (3)

#### Second Semester

EDPR 2111 - Development Across Lifespan Credit Hours: (3) ENGL 2201 - Literary Heritage \*\* Credit Hours: (3) OR ENGL 2202 - Lit Heritage: African-American \*\* Credit Hours: (3) ESMS 2015 - Resistance/Aerobic Training Applications Credit Hours: (3) PETE Concentration (3)\*\* Coaching Concentration (3)\*\*\*

#### Year Totals : 30 Hours

Junior Year

#### **First Semester**

COMM 2381 - Oral Communication \*\* **Credit Hours:** (3) ESMS 3502 - Prevention/Care of Athletic Injuries **Credit Hours:** (3) PETE 3307 - Psychosocial Aspect of Sport\*\* **Credit Hours:** (3) Coaching Concentration (3)\*\*\* Elective (3)

#### Second Semester

ESMS 3700 - Exercise Physiology Introduction Credit Hours: (3) ESMS 3853 - Motor Behavior Credit Hours: (3) PETE 3308 - Exceptional Learner Phys Ed Credit Hours: (3) PETE 3800 - Instr Strategies Phys Ed Credit Hours: (3) Coaching Concentration (3)\*\*\*

Year Totals : 30 Hours

#### Senior Year

#### **First Semester**

ESMS 3405 - Introduction to Structural and Functional Kinesiology Credit Hours: (3) Coaching Concentration (3)\*\*\* Elective (7)

#### Second Semester

PETE 4605 - Internship Credit Hours: (3-9) (6 credit hours required by program) Elective (9)

Year Totals : 28 hours

#### Total Hours Required for Graduation: 120

#### \*Must satisfy University General Education Program Requirement

\*\*PETE Concentration - Select 2 of the following four courses: PETE 2001, PETE 2002, PETE 2003, PETE 2010

\*\*\*Coaching Concentration: PETE 3400, PETE 3450, PETE 3500, PETE 3550, PETE 3600

# **School of Public Health**

James G. Gurney, Ph.D, Dean and Professor 232 Robison Hall (901) 678-1706 sphadmin@memphis.edu

# Mission

To produce the next generation of interdisciplinary public health leaders who can influence population health. Using the expertise of faculty and academic practice partners, promote health equity through innovation and excellence in interdisciplinary education, research, service, community engagement.

# Vision

To be recognized as one of the nation's premier metropolitan schools of public health, and a leader in education, research and practice.

# Values

Faculty, staff, and students wholeheartedly adopt the University's motto-Driven by doing. Similarly, the School of Public Health's values are:

The pursuit of excellence in teaching and research as the highest measure of successful achievement

Interdisciplinary collaboration and research as vehicles for leveraging our resources, solving problems, and multiplying our accomplishments The transfer and dissemination of knowledge with community stakeholders for the intellectual, economic, and social advancement of our community

Innovation and creativity in everything we do

Respect for diversity and individual worth

Integrity and transparency in all our actions

Responsible stewardship and conservation of resources

Stewardship of wisdom, knowledge, and information created by our predecessors

Leadership and involvement in the economic, social, and professional growth of Memphis, the State of Tennessee, and the nation

# **Public Health (BSPH)**

Public health is an interdisciplinary field encompassing the science and practice of promoting the health and well-being of communities and populations. This happens through such approaches as health education, health analytics, identifying and addressing social and other determinants of health, preventive interventions and services, and the monitoring and control of communicable diseases and environmental hazards.

The Bachelor of Science in Public Health major at the University of Memphis is designed to provide students with a strong foundation in public health through evidence-informed course content; a curriculum based on established competencies, best practices, and accreditation standards; and community-based internships and practicum experiences. The Public Health B.S. degree is recommended for students planning to pursue a career or continue graduate education in Public Health or related biomedical fields.

#### UMdegree

You can review information regarding your current academic pursuits, including Degree Requirements, General Education Requirements, Major/Concentration Requirements, and Minor Requirements by accessing the UMdegree audit tool. This tool reflects all changes to a student's academic record and is used in determining whether or not a student has successfully completed all graduation requirements. www.my.memphis.edu

#### **Program Summary for BSPH**

I. General Education 41 hours
II. Integrated Public Health Core 30 hours
III. Interdisciplinary Core 15 hours
IV. Field Experience & Capstone 5 hours

**V.** Guided Electives 12 hours **VI.** General Electives 17 hours

#### Minimum Required for Graduation: 120 hours

Students must complete at least 62 hours of upper-division credit (3000 or 4000-level). Students must complete at least 30 of the last 60 hours through the University of Memphis.

#### University General Education Program (41 hours)

See University General Education Program for the General Education requirements.

#### Integrated Public Health Core (30 hours)

PUBH 3120 - Environmental Health 1: Basics & Method Credit Hours: (3)
PUBH 3130 - Introduction to Social Determinants of Health Credit Hours: (3)
PUBH 3150 - Analytic and Research Methods in Public Health I Credit Hours: (3)
PUBH 3180 - Public Health Principles & Practices I Credit Hours: (3)
PUBH 3710 - Public Health Systems & Policy I Credit Hours: (3)
PUBH 4121 - Environmental Health II: Practice and Application Credit Hours: (3)
PUBH 4131 - Social Justice & Public Health Credit Hours: (3)
PUBH 4151 - Analytic and Research Methods in Public Health II Credit Hours: (3)
PUBH 4181 - Public Health Principles & Practices II Credit Hours: (3)
PUBH 4181 - Public Health Principles & Plactices II Credit Hours: (3)
PUBH 4711 - Public Health Systems & Policy II Credit Hours: (3)

#### Interdisciplinary Core (15 hours)

ANTH 4511 - Medical Anthropology Credit Hours: (3) ANTH 4531 - Alcohol/Drugs/Culture Credit Hours: (3) COMM 4015 - Health Literacy Credit Hours: (3) HLSC 4200 - Cultural Competence in Health Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3)

#### Field Experience & Capstone (5 hours)

PUBH 4010 - Field work Credit Hours: (2) PUBH 4985 - Capstone Experience Credit Hours: (3)

#### Senior Capstone Experience (3 hours)

The senior Capstone Experience is a student's culminating experience or capstone designed to synthesize and integrate the content of a student's program of study. The senior project is intended to coalesce the theoretical and applied areas of study into an academically-relevant example of scholarship. Students will complete research on a topic of their choice with approval of their senior project instructor. The senior capstone project is completed during a student's final semester and includes a completed e-portfolio.

### Guided Electives: (12 hours)

Select at least four (4) courses from the list below:

PUBH 3101 - Environ Health in the Media Credit Hours: (3) PUBH 3102 - Epidemics: The Plague to Ebola Credit Hours: (3) ANTH 3500 - Anth of Global Health \*\* Credit Hours: (3) ANTH 3511 - Culture/Kin/Family Credit Hours: (3) ANTH 4111 - Evolution and Human Health Credit Hours: (3) ANTH 4417 - Food, Culture, Power Credit Hours: (3) ANTH 4521 - Culture, Soc & Mental Health Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) CDFS 3401 - Parent Child Relations Credit Hours: (3) CDFS 3410 - Soc Emotion Lrng Early Child Credit Hours: (3) CJUS 4460 - Race, Ethnicity and Justice in America Credit Hours: (3) COMM 4016 - Public Health Campaigns Credit Hours: (3) HLSC 4100 - Health and Aging Credit Hours: (3) NUTR 4602 - Community Nutrition Credit Hours: (3) SOCI 4851 - Medical Sociology Credit Hours: (3) SWRK 4061 - Substance Abuse Treatment Credit Hours: (3) SWRK 3902 - Human Behavior/Soc Envrnmnt Credit Hours: (3)

### General Electives: (17 hours)

Electives will be chosen to bring the total number of hours to 120 with a minimum of 62 upper-division hours.

### Total Hours Required for Graduation: 120

Students must complete at least 62 hours of upper-division credit (3000 or 4000-level). Students must complete at least 30 of the last 60 hours through the University of Memphis.

# **Public Health Minor**

Public Health is the science of protecting the health of people and the communities where they live, learn, work, and play. The Public Health Minor is designed to provide students with an understanding of the connections between public health and every aspect of life as well as the analytic approaches to understanding these connections. The minor can be an asset to students in determining their interest in graduate studies or pursuing public health or other health-related careers. **The Public Health Minor requires a total of 18 hours**.

# Lower Division Core (3 Hours)

Choose one of two options:

PUBH 1180 - Population Health and Society Credit Hours: (3) HLSC 2200 - Introduction to Public Health & Health Sciences Credit Hours: (3)

# Upper Division Core (9 Hours)

Select any three courses:

PUBH 3120 - Environmental Health 1: Basics & Method Credit Hours: (3) PUBH 3130 - Introduction to Social Determinants of Health Credit Hours: (3) PUBH 3180 - Public Health Principles & Practices I Credit Hours: (3) PUBH 3150 - Analytic and Research Methods in Public Health I Credit Hours: (3) PUBH 3710 - Public Health Systems & Policy I Credit Hours: (3)

# Electives (6 Hours)

Select two courses from the following:

ANTH 4511 - Medical Anthropology Credit Hours: (3) ANTH 4571 - Race and Health Disparities Credit Hours: (3) BIOL 4241 - Biogeog/GIS Analyses/Ecology Credit Hours: (3) COMM 3012 - Health Communication \*\* Credit Hours: (3) COMM 4015 - Health Literacy Credit Hours: (3) HLSC 4200 - Cultural Competence in Health Credit Hours: (3) PHIL 3514 - Biomedical Ethics \*\* Credit Hours: (3) The online catalog can be accessed at: http://catalog.memphis.edu/index.php PUBH 3102 - Epidemics: The Plague to Ebola Credit Hours: (3) SOCI 4442 - Sociology of Poverty Credit Hours: (3) SOCI 4541 - Sociology of Aging Credit Hours: (3)

# **UofM Global**

#### Through UofM Global, the University of Memphis brings learning to you.

UofM Global degree programs are developed by University of Memphis faculty for University of Memphis students. Our online courses provide flexibility and portability, so you can access your class and the many resources available to you as a student at a major university. Most of our online courses and programs are also completely asynchronous, semester-based classes. You can **participate in class anytime, anywhere** with other students as you work through the same content week by week.

# **Global Undergraduate Programs**

More information regarding global programs can be found at: UofM Global Experience **Contact Information:** 844.302.3886 or via e-mail at uofmglobal@memphis.edu

# FedEx LiFE

UofM Global collaborated with FedEx to offer FedEx Memphis Hub employees a higher education degree program, LiFE: Learning inspired by FedEx. There are potentially no out of pocket costs (as long as you work at the FedEx Memphis Hub location and are in good academic standing). Plus you will have courses suited to your prior education, 24/7 tutoring and a UofM Global LiFE Coach to help you along the way. More information can be found at: UofM Global LiFE

Contact Information: 901.808.5800 or via e-mail at: LiFE

# **Courses-Undergraduate**

Courses offered only online or both online and on-ground are indicated with (\*\*)asterisks.

#### ACAD 1100 - Academic Strategies

**Credit Hours:** (3) **Description:** History, philosophy, and principles of higher education, with emphasis on the University of Memphis. Special attention to developing student skills necessary to meet the intellectual expectations of the university.

High Impact Practice Code: Learning Community, Study Abroad

#### ACAD 1102 - Intro To University II

Credit Hours: (2)

#### ACAD 2200 - Academic Success Seminar

**Credit Hours:** (1) **Description:** Strategies and practices that have proven successful with students returning from academic suspension. Permit required.

#### ACCT 2010 - Fundamentals of Acct I \*\*

**Credit Hours:** (3) **Former:** (TBR: ACCT 1010) **Description:** Introduction to measurement, realization, classification and disclosure concepts about businesses' financial statement; emphasis on how managers, creditors, and investors can analyze financial accounting information to make investment, financing, and operating decisions.

#### ACCT 2020 - Fundamentals of Acct II \*\*

**Credit Hours:** (3) **Former:** (TBR: ACCT 1020) **Description:** Introduction to measurement and disclosure concepts about cost and profit of products, services, and organizational units; emphasis on how managers can use internal and external information to make resource allocation decisions, to plan and to control investment and make operating decisions. **PREREQUISITE:** ACCT 2010, MATH 1710 or MATH 1830.

#### ACCT 3000 - Career Development for ACCT

**Credit Hours:** (3) **Description:** An examination of the principles of managing career change through a review of employment trends, contemporary human resource, recruiting objectives, perception theory related to employability, and employment requirements for today's global business environment. Self-leadership, managing change, and personal career development techniques will be highlighted as concepts related to applying career change effectively. This course also requires completion of an accounting practice set. Students are encouraged to take MGMT 3510 before or at the same time as this class. **PREREQUISITE:** B- or Better in ACCT 2010 and ACCT 2020.

**Credit Hours:** (3) **Description:** Elements of law and legal principles encountered in business; emphasis on basic law of contracts, sales and secured transactions, negotiable instruments, real and personal property, agency, forms of business organizations, suretyship, insurance contracts and torts. For non-accounting majors, accounting majors should instead take ACCT 4250.

#### ACCT 3110 - Intermediate Accounting I \*\*

**Credit Hours:** (3) **Description:** Review of accounting process and financial statements; time value of money; cash and receivables. **PREREQUISITE:** ACCT 2010 and ACCT 2020 with a B- or better. **COREQUISITE:** ACCT 3000

#### ACCT 3120 - Intermediate Accounting II \*\*

**Credit Hours:** (3) **Description:** Inventories; long-term tangible and intangible assets; investments; current and long-term liabilities. **PREREQUISITE:** ACCT 3000 and ACCT 3110

#### ACCT 3130 - Legal/Social/Political Environ \*\*

**Credit Hours:** (3) **Description:** Emphasis on legal, social, and political environment in which business and its executives exist; legal, social, and political forces that affect business operations; lectures and case discussions.

#### ACCT 3310 - Cost Accounting \*\*

**Credit Hours:** (3) **Description:** Cost systems, including job order, process, and standard, as management information systems for planning and control. Allocation of indirect costs, preparation of variable budgets, and determination of standard cost variances and their meaning. **PREREQUISITE:** ACCT 2010 and ACCT 2020 with a B-or better.

#### ACCT 3510 - Federal Income Tax I \*\*

**Credit Hours:** (3) **Description:** Introduction to the federal income taxation of individuals. **PREREQUISITE:** ACCT 2020.

#### ACCT 4020 - Accounting Info Technology \*\*

**Credit Hours:** (3) **Former:** (Accounting Systems) **Description:** Accounting systems analysis and design emphasizing the accounting cycles approach; theory of systems control in an organizational setting; holistic approach of synthesizing the accounting, financing, operating, and production functions where applicable. **PREREQUISITE:** ACCT 3110 and ACCT ACCT 3310

#### ACCT 4130 - Intermediate Accounting III \*\*

#### ACCT 3011 - Business Law \*\*

**Credit Hours:** (3) **Description:** Advanced topics in financial accounting including leases, pensions, earnings per share, and accounting changes and errors. **PREREQUISITE:** C- or better in ACCT 3120

#### ACCT 4240 - Audit/Assurance Services \*\*

**Credit Hours:** (3) **Description:** Internal and external auditing from a broad perspective that includes topics such as standards and procedures, internal controls, information technology, business processes and improvements, risk assessment, audit programs and reports to managers and clients. **PREREQUISITE:** C- or better in ACCT 3110 and ACCT 3310

#### ACCT 4250 - Accounting Ethics/Regulation \*\*

**Credit Hours:** (3) **Description:** Foundations of ethics including integrity, objectivity, independence, ethical reasoning, ethical decision-making and ethical dilemmas from the point of view of a professional accountant; legal topics, codes of professional conduct relating to accounting profession and accountancy regulatory bodies; related state and national regulatory requirements. Ethical case studies on topics of professional accounting responsibility. **PREREQUISITE or COREQUISITE:** ACCT 4240.

#### ACCT 4310 - Data Analytics for Accountants

**Credit Hours:** (3) **Description:** The course covers the analysis of data as it pertains to accounting professionals. The focuses include analytic techniques for business intelligence and the examination of "big data" involving accounting information. Identifying and using archival databases for accounting-oriented decision-making, and applying necessary processes to unstructured data sources. Hands-on experiences via multiple detailed cases and projects will develop skills with select software tools used in data analytics in accounting. **PREREQUISITE:** ACCT 3120, ACCT 4020, and MIS 3210

#### ACCT 4320 - Managerial Decision Making/Accounting

**Credit Hours:** (3) **Description:** Evolution of management accounting: functional tools used by managers/controllers; written and oral communication skills in the context of management accounting. Students will develop accounting data analytic skills and apply them to business setting using business cases. **PREREQUISITE:** ACCT 3120, ACCT 3310.

#### ACCT 4540 - Govt/Health/Non-Profit

**Credit Hours:** (3) **Description:** Basic accounting and reporting procedures for governmental units, universities and other not-for-profit entities. **PREREQUISITE:** ACCT 3110 or permission of instructor.

#### ACCT 4625 - InternI Acct/IFRS/US GAAP \*\*

1136 **Credit Hours:** (3) **Description:** Major similarities and differences between US GAAP and International Financial Reporting Standards (IFRS); international issues related to taxation and financial statement analysis. **PREREQUISITE or COREQUISITE:** <u>ACCT 3120</u>

#### ACCT 4910 - Problems in Accounting \*\*

**Credit Hours:** (1-3) **Description:** Students will conduct approved projects in major area under supervision of faculty. **PREREQUISITE:** permission of director.

#### ACCT 4911 - Internship in Accounting

**Credit Hours:** (1-6) **Description:** Internship in business organization to gain on-the-job experience. Project to be approved, supervised by departmental faculty member. Credit allowed only after acceptance of report, varies with complexity of duties. **PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

#### ACCT 4920-4929 - Special Topics in Accounting

Description: Topics vary by semester, see online class schedule listing.

#### ACCT 4996 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research open only to those students enrolled in the honors program. Thesis supervised by faculty member; approved by the Director of the School. **PREREQUISITE:** senior standing and permission of the director of the college honors program.

#### ADVR 3300 - Intro to Advertising \*\*

**Credit Hours:** (3) **Description:** Exploring advertising as a career and a field. Both traditional and non-traditional advertising will be studied. Problems and techniques of planning and coordinating an integrated series of advertising efforts for a successful plan will be discussed.

#### ADVR 3310 - Branding and Strategic Media

**Credit Hours:** (3) **Description:** Exploration of how branding and strategic media (advertising and public relations) move members of the target audience from the point of awareness to the point of engagement. Concepts such as using brands to create market value, brand equity and brand power, and developing brand strategies and tactics will be explored. Branding campaigns will be created and evaluated. **PREREQUISITE:** ADVR 3300 or PBRL 3400 and Permit and 45 hours

#### ADVR 3320 - Strategic Account Management

**Credit Hours:** (3) **Description:** Exploration of how account management is the center of decision-making and problem-solving critical skills in today's strategic media structure. Trends in account management, such as the account management information system will be included. **PREREQUISITE:** ADVR 3300 or PBRL 3400

#### ADVR 3324 - Creative Strategy

**Credit Hours:** (3) **Description:** Introduction to advertising creative strategy. Students learn the creative process, copywriting, and design. Students learn how to create print advertising, banner advertising, radio advertising, TV advertising, outdoor advertising, and social media advertising. Fee \$35 per credit hour One lecture hour, four laboratory hours per week. **PREREQUISITE:** JRSM 2121; JRSM 3905 or JRSM 3900.

#### ADVR 3330 - Analytics & Evaluation

**Credit Hours:** (3) **Description:** Gathering, understanding, and utilizing social media analytics for a variety of platforms. Students will become certified in multiple social media analytics platforms. **PREREQUISITE:** ADVR 3300 or PBRL 3400

#### ADVR 4326 - Advertising Research

**Credit Hours:** (3) **Description:** Fundamentals in advertising research; nature of the market, appropriate advertising strategies, message effectiveness and media audiences; primary and secondary research, sampling, questionnaire design, survey, and data processing and analysis. **PREREQUISITE:** JRSM 2121, ADVR 3300, MKTG 3010. **COREQUISITE:** ADVR 4327.

#### ADVR 4327 - Media Planning

**Credit Hours:** (3) **Description:** Procedures for analyzing the advertising situation, writing advertising and media goals, and setting advertising appropriations. Use of a microcomputer program to develop and evaluate optimum advertising media schedules. **PREREQUISITE:** JRSM 2121, ADVR 3300 and MKTG 3010. **COREQUISITE:** ADVR 4326

#### ADVR 4328 - Strategic Adv Campaigns

**Credit Hours:** (3) **Description:** Development of an integrative campaign and its execution in include all advertising and promotion applications. (Sp) **PREREQUISITE:** ADVR 3324, ADVR 4326, ADVR 4327, or permission of instructor.

#### ADVR 4830 - Directed Indiv Study

**Credit Hours:** (1-3) **Description:** Independent study and research, or practicum, or project under supervision. Repeatable. Repeatable May be repeated for a maximum of 3 hours credit. **PREREQUISITE:** Permission of instructor

#### AERO 1111 - The Heritage & Values of the USAF I

**Credit Hours:** (1) **Description:** "Heritage and Values of the United States Air Force," is a survey course designed to introduce students to the United States Air Force and provides an overview of the basic characteristics, missions, and organization of the Air Force.

#### AERO 1112 - Heritage & Values of the USAF II

#### Credit Hours: (1)

Description: Continuation of AERO 1111.

"Heritage and Values of the United States Air Force," is a survey course designed to introduce students to the United States Air Force and provides an overview of the basic characteristics, missions, and organization of the Air Force. NOTE: \*Leadership Laboratory. Freshman/Sophomore level topics (supporting the General Military Course) include Air Force customs and courtesies, drill and ceremonies, issuing military commands, instructing, environment of the Air Force officer, and officer opportunities. Junior/Senior level topics (supporting the Professional Officer Course) include such advanced leadership experiences as planning and controlling cadet wing activities, preparing and presenting oral and written communication, and providing the guidance and information needed to train and motivate other cadets. One and one-half hours per week.

#### AERO 2211 - Team & Leadership Fundamentals I

**Credit Hours:** (1) **Description:** "Team and Leadership Fundamentals," focuses on laying the foundation for teams and leadership. The topics include skills that will allow cadets to improve their leadership on a personal level and within a team. The courses will prepare cadets for their field training experience where they will be able to put the concepts learned into practice. The purpose is to instill a leadership mindset and to motivate sophomore students to transition from AFROTC cadet to AFROTC officer candidate.

#### AERO 2212 - Team & Leadership Fundamentals II

#### Credit Hours: (1)

Description: Continuation of AERO 2211.

"Team and Leadership Fundamentals," focuses on laying the foundation for teams and leadership. The topics include skills that will allow cadets to improve their leadership on a personal level and within a team. The courses will prepare cadets for their field training experience where they will be able to put the concepts learned into practice. The purpose is to instill a leadership mindset and to motivate sophomore students to transition from AFROTC cadet to AFROTC officer candidate. NOTE: \*Leadership Laboratory. Freshman/Sophomore level topics (supporting the General Military Course) include Air Force customs and courtesies, drill and ceremonies, issuing military commands, instructing, environment of the Air Force officer, and officer opportunities. Junior/Senior level topics (supporting the Professional Officer Course) include such advanced leadership experiences as planning and controlling cadet wing activities, preparing and presenting oral and written communication, and providing the guidance and information needed to train and motivate other cadets. One and one-half hours per week.

#### AERO 3311 - Leading People/Effective Communication I

**Credit Hours:** (3) **Description:** "Leading People and Effective Communication," teaches cadets advanced skills and knowledge in management and leadership. Special emphasis is placed on enhancing leadership skills and communication. Cadets have an opportunity to try out these leadership and management techniques in a supervised environment as juniors and seniors.

# AERO 3312 - Leading People/Effective Communication II

#### Credit Hours: (3)

#### Description: Continuation of AERO 3311.

"Leading People and Effective Communication," teaches cadets advanced skills and knowledge in management and leadership. Special emphasis is placed on enhancing leadership skills and communication. Cadets have an opportunity to try out these leadership and management techniques in a supervised environment as juniors and seniors. NOTE: \*Leadership Laboratory. Freshman/Sophomore level topics (supporting the General Military Course) include Air Force customs and courtesies, drill and ceremonies, issuing military commands, instructing, environment of the Air Force officer, and officer opportunities. Junior/Senior level topics (supporting the Professional Officer Course) include such advanced leadership experiences as planning and controlling cadet wing activities, preparing and presenting oral and written communication, and providing the guidance and information needed to train and motivate other cadets. One and one-half hours per week.

#### AERO 4411 - National Security/Active Duty Prep I

**Credit Hours:** (3) **Description:** "National Security Affairs/Preparation for Active Duty," is designed for college seniors and gives them the foundation to understand their role as military officers in American society. It is an overview of the complex social and political issues facing the military profession and requires a measure of sophistication commensurate with the senior college level. The final semester provides information that will prepare the cadets for Active Duty.

#### AERO 4412 - National Security/Active Duty Prep II

#### Credit Hours: (3)

#### Description: Continuation of AERO 4411.

"National Security Affairs/Preparation for Active Duty," is designed for college seniors and gives them the foundation to understand their role as military officers in American society. It is an overview of the complex social and political issues facing the military profession and requires a measure of sophistication commensurate with the senior college level. The final semester provides information that will prepare the cadets for Active Duty. NOTE: \*Leadership Laboratory. Freshman/Sophomore level topics (supporting the General Military Course) include Air Force customs and courtesies, drill and ceremonies, issuing military commands, instructing, environment of the Air Force officer, and officer opportunities. Junior/Senior level topics 1138 (supporting the Professional Officer Course) include such advanced leadership experiences as planning and controlling cadet wing activities, preparing and presenting oral and written communication, and providing the guidance and information needed to train and motivate other cadets. One and one-half hours per week.

#### AAAS 2100 - Intro Afr/Afr American Study \*\*

**Credit Hours:** (3) **Description:** Status of Africans and African Americans in historical and modern times.

#### AAAS 3100 - Research Method/Afr American \*\*

**Credit Hours:** (3) **Description:** Students design research project focusing on African and African American experiences and issues.

#### AAAS 4100 - Seminar Afr/Afr Amer Studies \*\*

**Credit Hours:** (3) **Description:** Capstone course to provide an integrated and interdisciplinary understanding of the black experience which arises from culture, society, and the natural world.

#### AAAS 4251 - African Religions/Diaspora

**Credit Hours:** (3) **Description:** Transplantation of African religions to the Western hemisphere; change in religions over time; African religious thought; retention, adaptation, hybridity in religious movements.

#### AAAS 4351 - Ghanaian Hist/Culture

**Credit Hours:** (3) **Description:** Study of the history and cultures of Ghana.

#### AAAS 4451 - Rhetoric of Hip Hop \*\*

**Credit Hours:** (3) **Description:** Movement of hip-hop from its original expressions of a hidden sub-culture to its widespread acceptance in mainstream American culture.

#### AAAS 4501 - Internship

**Credit Hours:** (3-6) **Description:** Supervised internship working with public and private institutions. Seminar sessions to discuss and analyze problems facing interns. **PREREQUISITE:** permission of program director.

#### AAAS 4901 - Independent Study \*\*

**Credit Hours:** (1-3) **Description:** Readings and writing assignments designed to further understanding of specialized areas within African and African American Studies. Repeatable May be taken for a maximum of 6 hours credit when topic varies.

# AAAS 4990-4999 - Special Topics in African and African American Studies.

Description: Topics vary by semester, see online class schedule listing.

#### ANTH 1100 - Biol Anth & Prehistory \*\*

**Credit Hours:** (3) **Description:** Evolutionary basis of human origins and contemporary biocultural variation; fossil record of primate and hominid evolution; beginnings of human society; discovery of agriculture and emergence of complex societies; controversies in the search for human origins. **[G]** *Cross listing:* (Same as ESCI 1100)

High Impact Practice Code: Learning Community

#### ANTH 1200 - Cultural Anthropology \*\*

**Credit Hours:** (3) **Description:** Global comparison of cultural traits and traditions such as social relations, language, religion and ritual, and problems of developing nations or minority groups in modern world. **[G]** 

High Impact Practice Code: Learning Community

#### ANTH 2300 - Great Discoveries Archaeology

**Credit Hours:** 3 **Description:** Great discoveries of archaeology that underlie our understandings of ancient societies and social institutions are explored. Overviews of major archaeological investigations, the archaeologists, and contemporary excavation practices; beginnings of society; discovery of agriculture; and the emergence of complex societies provide the basis to emphasize basics of the scientific methods of archaeology and the obligation to learn from prehistory. *Cross listing:* ESCI 2300

#### ANTH 2301 - Fundamentals of Archaeology

**Credit Hours:** (4) **Description:** Hands-on experience in archaeological methods; survey of past civilizations; critical evaluation of how modern archaeological methods and theories are applied. **PREREQUISITE:** ANTH 1100, recommended. *Cross listing:* (Same as ESCI 2301)

#### **ANTH 3010 - Practicing Anthropology**

**Credit Hours:** (3) **Description:** This course is designed to help prepare undergraduate anthropology majors and minors to pursue "anthropological" careers. It surveys the history, ethics, and methods of applied and practicing anthropology, and the contribution of anthropologists to solving human problems. It explores the differences between academic and practicing anthropology and offers opportunities to engage with professionals in a range of fields. Finally, it covers graduate studies and admissions and how to search and prepare for jobs in applied anthropology.

#### ANTH 3111 - Human Paleontology

# ANTH 3200 - Culture and Change around the World

#### Credit Hours: (3)

**Description:** Ethnographic perspectives on culture and change in various contexts around the world. Required for Anthropology major or minor. **PREREQUISITE:** ANTH 1200, or permission of instructor. *Cross listing:* ESCI 3200

#### ANTH 3201 - Anthropology of the Internet

**Credit Hours:** (3) **Description:** Anthropological perspectives on the Internet and related technologies; on-line cultures, culture change, and novel cultural interactions; meanings and implications of cyborg nature; technologies as tools of power and resistance; on-line ethnographies; applied anthropology and virtual communities.

#### **ANTH 3203 - Anthropology of Popular Music**

**Credit Hours:** (3) **Description:** This course considers the cultural meanings, politics, and experiences of popular music. In this class, we will use anthropological theory to examine key issues in the study of popular music as a cultural artifact including the "popular," authenticity, appropriation, ideology, high/low art, consumption, performance, subculture, and more. In addition, this class will explore the relationship between popular music and identity (race, class, gender, sexuality) and the processes of social construction and reification. Our aim in this class is to understand and apply anthropological approaches to popular music.

#### ANTH 3242 - Peoples of Africa

**Credit Hours:** (3) **Description:** Description and distribution of peoples and cultures of Africa; comparisons and interrelationships during pre- and post-contact periods.

#### ANTH 3253 - Anthropology of Religion

#### Credit Hours: (3)

#### **Description:**

Explores theories of magic and religion around the world; lived experience of magic and religion; links between belief and ritual in broader cultural context; roles of magical and religious specialists; impact of culture change on religion. Designed for both majors and non-majors.

#### ANTH 3282 - American Communities \*\*

**Credit Hours:** (3) **Description:** Cultural historic interpretation of formation, development and transformation of diverse community life patterns in United States; analysis of community as it reflects change in American society; exploration of contemporary approaches to

community-building. [G]

High Impact Practice Code: Study Abroad

#### **ANTH 3300 - Ancient Civilizations**

**Credit Hours:** (3) **Description:** The origin of social complexity, agriculture, and urbanism; comparison of early civilizations; was civilization a good thing?

#### ANTH 3500 - Anth of Global Health \*\*

**Credit Hours:** (3) **Description:** Anthropological approaches to understanding and addressing global health inequalities; cultural, ecological and political economic factors shaping health and illness across the globe; role of states, non-governmental organizations and other institutions in health policy. Designed for both majors and non-majors.

#### ANTH 3511 - Culture/Kin/Family

**Credit Hours:** (3) **Description:** Changing structure of family in Western and non-Western societies; cross-cultural approaches to mate selection, courtship rituals, kinship organization, institution of marriage, division of labor and authority in household, and childbearing; variation and flexibility in family structures as adaptive strategies for environmental, social and cultural change.

#### ANTH 3541 - Anthropology of Food and Nutrition

**Credit Hours:** (3) **Description:** Relationship between food and culture; foodways; meanings of food in relation to identity, nationalism, political economy, gender, class, race, labor, globalization; cultural perspectives on diet and nutrition; hunger.

#### **ANTH 4010 - Ethnographic Methods**

**Credit Hours:** (3) **Description:** Various qualitative and quantitative methods of anthropological research; includes preparing for field research, collecting data, analyzing data and writing ethnographic descriptions of contemporary societies. **PREREQUISITE:** ANTH 3200, or permission of instructor.

#### **ANTH 4065 - Anthropological Theory**

**Credit Hours:** (3) **Description:** Contemporary growth of theories and methods in anthropology. Required for Anthropology major or minor. **PREREQUISITE:** ANTH 3200

#### **ANTH 4111 - Evolution and Human Health**

**Credit Hours:** (3) **Description:** Implications of human evolutionary history for understanding human variation and contemporary health issues, including chronic and infectious disease; focus on importance of ecological and social context in shaping human development across the lifespan. **PREREQUISITE:** ANTH 1100, or permission of instructor.

# ANTH 4220 - Culture, Environment and Justice

**Credit Hours:** (3) **Description:** This course looks at the intersections of culture, the environment, and social justice. This includes how people construct ideas about "nature" and attribute value to it, how people construct claims to "nature," and how those claims produce and perpetuate social and health inequalities. It examines historical and contemporary environmental movements including market-based strategies (conservation tourism, going "green," ethical consumption) and rights-based initiatives (human rights, environmental justice, indigenous rights). *Cross listing:* 6220

#### ANTH 4221 - Gender and Culture

**Credit Hours:** (3) **Description:** This course provides an overview of different anthropological approaches to the study of gender and sexuality. Issues discussed will include: evolutionary perspectives and bio-cultural perspectives on sex/gender, the domestic/public divide and the division of labor, social variations in cultural constructions of femininity and masculinity, queering the anthropological approach to gender and sexualities, and the mutually-constitutive roles of the state in gendered/sex practices. The course provides students a theoretical foundation for understanding gender as a central issue in anthropological pursuits. *Cross listing:* 6221

#### ANTH 4223 - Refugees and Humanitarianism

**Credit Hours:** (3) **Description:** Critical look at human displacement from the perspective of refugees; modern category of the "refugee"; the refugee camp; displacement; statelessness, and the state; the politics and practices of humanitarian aid; repatriation and resettlement. *Cross listing:* 6223

#### ANTH 4270 - Ancient Human Soc/Envir Chng

**Credit Hours:** (3) **Description:** Examination of past people and their environments from the Ice Age to recent times; archaeological and paleoecological data. Three lecture hours per week. *Cross listing:* (Same as ESCI 4270)

#### ANTH 4301 - Archaeology of the Americas

**Credit Hours:** (3) **Description:** Intensive study of various prehistoric cultures of the Americas from earliest times until historic contact. **PREREQUISITE:** ANTH 1100, ANTH 1200, or permission of instructor. *Cross listing:* (Same as ESCI 4301)

#### **ANTH 4302 - Native People of North America**

**Credit Hours:** (3) **Description:** Ethnology of North America; intensive study of various prehistoric cultures from earliest times until historic contact. **PREREQUISITE:** ANTH 1100, ANTH 1200, or permission of instructor.

#### ANTH 4325 - Archaeol Fld/Lab Techn

**Credit Hours:** (3) **Description:** Instruction in field excavation, specimen preparation, use of survey instruments and photography, map making, archaeological record keeping; methods and techniques in archaeological laboratory analysis; emphasis on organization and supervision of laboratory procedures. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ESCI 4325)

#### ANTH 4335 - Analysis of Stone Artifacts

**Credit Hours:** 3 **Description:** Much of the prehistoric cultural record is pieced together through the analysis of stone artifacts. The class outlines the basics of stone "lithics" artifact anlysis through an in-depth study of current techniques, instrumentation, and theory. Lecture is augmented by class discussion and hands-on experimentation "flintknapping." *Cross listing:* ESCI 4335

#### ANTH 4350 - Archaeology of Collapse

**Credit Hours:** (3) **Description:** Emphasis on archaeology of regional politics and archaic states throughout the world. Overview of social and political collapse of complex societies. *Cross listing:* (Same as ESCI 4350)

#### ANTH 4352 - Archaeology/World Prehistory

**Credit Hours:** (3) **Description:** Global survey of cultures from first humans to early civilizations. *Cross listing:* (Same as ESCI 4352)

#### ANTH 4365 - Cultural Resource Mgmt

**Credit Hours:** (3) **Description:** The majority of archaeological work in North America is conducted in compliance with tribal, state, and federal legislation in Cultural Resource Management (CRM). The ultimate goals of this course is to prepare students for CRM roles and responsibilities through learning the historic development, current legislation, practices and real world skills needed to conduct CRM work.

High Impact Practice Code: Learning Community

#### ANTH 4411 - Urban Anthropology

**Credit Hours:** (3) **Description:** Urban anthropology is concerned with the origin, development and evolution of cities as well as with the description and comparison of urban/suburban/exurban life and culture. In this course we will explore a range of techniques and theoretical approaches to understanding the nature and culture of contemporary cities. The seminar will focus on several themes, including urban poverty; urban health inequalities; race, class and housing; and social connectivity within urban environments. *Cross listing:* 6411

#### **ANTH 4412 - Neighborhood Development**

**Credit Hours:** (3) **Description:** Role of various institutions and their relationship to developmental needs of inner city neighborhoods; evolution of American cities as context for understanding urban

1141 neighborhoods and poverty; role of government and foundations in shaping policy at local level; rise of neighborhood associations and non-profits as extensions of family values; contributing to better understanding of neighborhoods and various intervention strategies. *Cross listing:* (Same as PADM 4412)

#### ANTH 4415 - Anthropology Human Rights

**Credit Hours:** (3) **Description:** Anthropological approaches to critical human rights issues, debates, practices including gender, children, health, land, genocide, resettlement; broadly-defined human rights in specific national and cultural contexts; explores what anthropology, practitioners, and ethnographic methods offer our understanding of how human rights are interpreted and negotiated. **PREREQUISITE:** ANTH 1200, or permission of instructor.

#### ANTH 4416 - Culture/Identity/Power

**Credit Hours:** (3) **Description:** Anthropological approaches to human identity in cross-cultural contexts. Examines how culture and power inform understandings and practices related to difference and stratification, and the forces of identity formation and reproduction cross-culturally with emphasis on ways that race, ethnicity, class, gender, sexuality, religion, nation, and community are constructed, negotiated, and resisted. **PREREQUISITE:** ANTH 1200, or permission of instructor.

#### ANTH 4417 - Food, Culture, Power

**Credit Hours:** (3) **Description:** Anthropological study at the intersection of the global industrialized food system and emerging alternatives; construction and negotiation of value, taste, and meaning of food throughout the life cycle of the food system, from field to fork and table to trash; marginality, power, and social action in food systems. *Cross listing:* 6417

#### ANTH 4418 - Anthropology of Organizations

#### **Credit Hours:** (3)

**Description:** Anthropological approaches to studying organizations and institutions; ongoing development and change of organizational culture; knowledge and innovation in organizations; non-governmental organizations (NGOs); global, multi-sited, and virtual organizations; applied anthropology in an organizational context; power relationships among communities, organizations, institutions, and elites; collaborative ethnographies in organizations.

#### **ANTH 4419 - Queer Anthropology**

**Credit Hours:** (3) **Description:** This course provides students with an introduction to anthropological perspectives on non-normative genders and sexualities in transnational context, paying careful attention to the ways in which sexuality and gender intersect with class, nation, and race.

# ANTH 4431 - Capitalism, Consumption, and Culture

**Credit Hours:** (3) **Description:** Advanced study of shopping and consumption from an anthropological perspective; contemporary consumer culture in the U S and around the world; emphasis on how consumption shapes/reflects individual identities and cultural trends; consumer movements and anticonsumerism; sociocultural and environmental impacts of consumer behavior; the role of ethnography in the market.

High Impact Practice Code: Learning Community

#### ANTH 4511 - Medical Anthropology

**Credit Hours:** (3) **Description:** Surveys the anthropology of health, illness, and curing systems, and how cultural, evolutionary, and environmental forces shape health and healing. Topics include ethnomedicine, nutrition, mental health, reproduction, addictions, health ecology, and evolutionary medicine. Examines how illness perceptions and health behaviors yield deeper insight into identity, values, agency, and health disparities. Considers roles for applied medical anthropology to improve care.

#### ANTH 4521 - Culture, Soc & Mental Health

**Credit Hours:** (3) **Description:** Examination of mental health and illness as a set of subjective experiences, social processes and objects of knowledge and intervention; cultural models of mental illness and healing; therapy as a cultural practice; substance abuse and addiction; mental health and relations of power; sociocultural dimensions of psycho-pharmacology.

#### ANTH 4531 - Alcohol/Drugs/Culture

**Credit Hours:** (3) **Description:** Cross-cultural comparison of beliefs, meanings and behaviors regarding alcohol and other drug use; biological, social, economic, and political dimensions of alcohol and drugs; implications for prevention and treatment.

#### ANTH 4551 - Culture/Sex/Childbirth

**Credit Hours:** (3) **Description:** Review of biological, environmental, social and cultural factors influencing human reproduction; comparison of cultural and clinical perspectives on sexual orientation and behavior, sexually transmitted diseases, fertility, birth control, pregnancy, birth and post-partum care; evaluation of alternative delivery systems in Western and non-Western societies.

#### ANTH 4571 - Race and Health Disparities

**Credit Hours:** (3) **Description:** History of scientific racism and race in the public and healthcare spheres; current understandings of human biological and genetic variation; role of cultural constructions of race in differential exposures to health hazards and access to health care; racial health disparities; strategies for addressing health inequalities.

#### ANTH 4660 - Museum Collections

**Credit Hours:** (3) **Description:** Theory, methods, collection policy, development, preservation, documentation, interpretation of museum collections. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ARTH 4660)

#### **ANTH 4661 - Collections Research**

**Credit Hours:** (3) **Description:** Introduces students in object based disciplines to museum collections research methods and application to exhibitions, catalogs, scholarly publications. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ARTH 4661)

#### ANTH 4662 - Museum Exhibitions

**Credit Hours:** (3) **Description:** Methods and theory of research, design, layout, object selection and handling, installation, public programming and evaluation. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ARTH 4662)

#### ANTH 4680 - Applied Archaeology/Museums

**Credit Hours:** (3) **Description:** Representations of cultural heritage in a broad array of public venues; repatriation, cultural patrimony, cultural resource management, civic engagement, rights and responsibilities of stakeholders, public involvement in museum representations, performance and education, culture and memory. *Cross listing:* (Same as ESCI 4680)

High Impact Practice Code: Learning Community

#### **ANTH 4970 - Directed Anth Internshp**

**Credit Hours:** (1-3) **Description:** Supervised practical experience in application of anthropological principles in agency or facility appropriate to discipline of anthropology. Student selects topic and partner organization in consultation with faculty supervisor and department chair. **PREREQUISITE:** permission of instructor.

High Impact Practice Code: Learning Community

#### **ANTH 4975 - Directed Ind Reading**

**Credit Hours:** (1-4) **Description:** Intensive guided survey of anthropological and related literature; student selects a topic in consultation with a faculty member and department chair.

#### ANTH 4985 - Direct Ind Research

**Credit Hours:** (1-3) **Description:** Intensive guided research, data analysis and presentation; student selects a topic in consultation with a faculty supervisor and department chair.

#### ANTH 4989 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Under direction of faculty member, and with approval of Honors Committee, student writes thesis based on research in primary and/or secondary sources

#### ANTH 4990-4999 - Special Topics in Anthropology

Description: Topics vary by semester, see online class schedule listing.

#### **MUAP 1100 - Introductory Class Piano**

**Credit Hours:** (1) **Description:** Beginning instruction in piano; development of basic reading, music theory and performance skills; open to non-music majors.

#### MUAP 1101 - Intermediate Class Piano

**Credit Hours:** (1) **Description:** Intermediate instruction in piano; further development of sight reading, music theory and performance skills acquired in MUAP 1100; open to non-music majors. **PREREQUISITE:** MUAP 1100 or permission of instructor

#### MUAP 1105 - Class Piano I

**Credit Hours:** (1) **Description:** Basic technique, repertoire, and skills based on major and minor white-key scales and diatonic harmonies. **PREREQUISITE:** MUTC 1001 or permission of instructor.

#### MUAP 1106 - Class Piano II

**Credit Hours:** (1) **Description:** Technique, repertoire, and skills based on major, minor, and modal scales. **PREREQUISITE:** MUAP 1105; MUTC 1008, MUTC 1010.

#### **MUAP 1110 - Trumpet Intro Instr**

**Credit Hours:** (1)

MUAP 1111 - Trumpet

**Credit Hours:** (2)

#### **MUAP 1112 - Commercial Music Trumpet**

Credit Hours: (2)

#### MUAP 1116 - Jazz Class Piano

**Credit Hours:** (1) **Description:** Basic harmonic patterns, chord symbol realization, voicing, basic rhythmic patterns. **PREREQUISITE:** MUSE 1105, or equivalency exam.

**MUAP 1118 - Class Instruction Guitar** 

1143 Credit Hours: (2) Former: (MUSE 1118) Description: Group instruction in basic classical guitar technique, chord study, and note reading. Open to non-music majors; no audition required.

#### MUAP 1120 - Horn Intro Instr

Credit Hours: (1)

MUAP 1121 - Horn

Credit Hours: (2)

#### MUAP 1130 - Trombone Intro Instr

Credit Hours: (1)

#### MUAP 1131 - Trombone

**Credit Hours:** (2)

#### MUAP 1132 - Commercial Music Trombone

Credit Hours: (2)

#### MUAP 1140 - Tuba Intro Instr

Credit Hours: (1)

MUAP 1141 - Tuba

Credit Hours: (2)

#### MUAP 1142 - Euphonium

Credit Hours: (2)

#### **MUAP 1150 - Cornett Intro Instr**

Credit Hours: (1)

MUAP 1151 - Cornett

Credit Hours: (2)

#### MUAP 1160 - Sackbut Intro Instr

Credit Hours: (1)

MUAP 1161 - Sackbut

Credit Hours: (2)

MUAP 1310 - Piano Intro Instr The online catalog can be accessed at http://catalog.memphis.edu/index.php Credit Hours: (1)

MUAP 1311 - Piano

Credit Hours: (2)

MUAP 1312 - Commerical Music Piano

Credit Hours: (2)

MUAP 1320 - Harpsichord Intro Instr

**Credit Hours:** (1)

MUAP 1321 - Harpsichord

Credit Hours: (2)

**MUAP 1330 - Organ Intro Instruction** 

**Credit Hours:** (1)

MUAP 1331 - Organ

Credit Hours: (2)

**MUAP 1410 - Percussion Intro Instr** 

Credit Hours: (1)

**MUAP 1411 - Percussion** 

**Credit Hours:** (2)

**MUAP 1412 - Commerical Music Percussion** 

Credit Hours: (2)

**MUAP 1413 - Ethnic Percussion** 

**Credit Hours:** (1)

**MUAP 1414 - Ethnic Percussion** 

**Credit Hours:** (2)

**MUAP 1415 - Commercial Music Mallets** 

Credit Hours: (1)

**MUAP 1510 - Violin Intro Instr** 

**Credit Hours:** (1)

Credit Hours: (2)

MUAP 1512 - Baroque Violin

Credit Hours: (2)

MUAP 1520 - Viola Intro Instr

Credit Hours: (1)

MUAP 1521 - Viola

Credit Hours: (2)

MUAP 1530 - Cello Intro Instr

Credit Hours: (1)

MUAP 1531 - Cello

Credit Hours: (2)

MUAP 1540 - Bass Intro Instr

Credit Hours: (1)

MUAP 1541 - Bass

Credit Hours: (2)

MUAP 1542 - Commercial Music Bass

Credit Hours: (2)

MUAP 1550 - Guitar Intro Instr

Credit Hours: (1)

MUAP 1551 - Guitar

Credit Hours: (2)

**MUAP 1552 - Commercial Music Guitar** 

Credit Hours: (2)

MUAP 1560 - Harp Intro Instr

**Credit Hours:** (1)

Credit Hours: (2)

MUAP 1570 - Viola Da Gamba Intr Ins

**Credit Hours:** (1)

MUAP 1571 - Viola Da Gamba

Credit Hours: (2)

MUAP 1610 - Voice Intro Instr

Credit Hours: (1)

MUAP 1611 - Voice

**Credit Hours:** (2)

**MUAP 1612 - Commercial Music Voice** 

**Credit Hours:** (2)

#### MUAP 1613 - Commercial Voice Intro Instr

**Credit Hours:** (1) Fee \$160.00

#### MUAP 1614 - Class Inst Voice

**Credit Hours:** (1) **Description:** Fundamentals of singing technique and literature explored in group and individual settings. Repeatable To 3 credits.

#### MUAP 1710 - Flute Intro Instr

Credit Hours: (1)

#### MUAP 1711 - Flute

Credit Hours: (2)

MUAP 1720 - Oboe Intro Instr

**Credit Hours:** (1)

#### MUAP 1721 - Oboe

Credit Hours: (2)

#### MUAP 1730 - Clarinet Intro Instr

Credit Hours: (1)

#### MUAP 1731 - Clarinet

Credit Hours: (2)

MUAP 1740 - Saxophone Intro Instr

Credit Hours: (1)

MUAP 1741 - Saxophone

Credit Hours: (2)

#### MUAP 1742 - Commercial Music Saxophone

Credit Hours: (2)

MUAP 1750 - Bassoon Intro Instr

Credit Hours: (1)

MUAP 1751 - Bassoon

**Credit Hours:** (2)

MUAP 1760 - Recorder Intro Instr

Credit Hours: (1)

MUAP 1761 - Recorder

Credit Hours: (2)

#### **MUAP 2001 - Symphonic Band**

**Credit Hours:** (1) **Description:** Performance of traditional and contemporary wind compositions. Participants chosen from this ensemble for basketball pep-bands. Open to music majors and non-music majors.

#### MUAP 2002 - Marching Band

**Credit Hours:** (2) **Description:** Selected ensemble that performs at all home football games and occasional out-of-town games in each season. Rehearsal approximately ten hours weekly. Open to music majors and non-music majors.

#### MUAP 2003 - University Band

**Credit Hours:** (1) **Description:** Concert performance of traditional and contemporary wind compositions. Participants are chosen from this ensemble for basketball pep-bands and usually have participated in Fall marching band. Open to music majors and non-music majors.

**Credit Hours:** (1) **Description:** Ensemble open to all students. Music includes contemporary gospel, spirituals, and gospel hymns. Serves as outlet for students interested in developing musical and personal capacities. Open to music majors as elective. Two class meetings per week.

#### MUAP 2007 - Collegiate Choir

**Credit Hours:** (1) **Description:** Choir for music and non-music majors; study and perform choral literature from variety of style periods and origins.

#### MUAP 2008 - Pep Band

**Credit Hours:** (1) **Description:** The Pep Band is a selected ensemble that performs at all men's and women's home basketball games, and occasional conference and national tournaments out-of-town each season. Rehearsals are approximately one hour weekly from November through March. Members chosen for this ensemble usually have participated in Marching Band in the previous fall semester. Open to music and non-music majors.

#### MUAP 2107 - Class Piano III

**Credit Hours:** (1) **Description:** Technique, repertoire, and functional skills pertinent to student's vocal or instrumental classification; non-diatonic harmonies. **PREREQUISITE:** MUAP 1106, MUTC 1009, MUTC 1011.

#### MUAP 2108 - Class Piano IV

**Credit Hours:** (1) **Description:** Technique repertoire and functional skills pertinent to student's vocal or instrumental classification; extended and altered harmonies. Successful completion satisfies the core requirements of the piano proficiency exam. **PREREQUISITE:** MUAP 2107; MUTC 1009, MUTC 1011.

#### **MUAP 2201 - Techniques in Woodwind Instru**

**Credit Hours:** (1) **Description:** Introduction to historical woodwind instruments; historical playing techniques for both historical and modern instruments.

#### MUAP 3004 - Wind Ensemble

**Credit Hours:** (1) **Description:** Select ensemble of instrumentalists. Study and performance of outstanding repertory for wind ensembles. Open to music majors and non-music majors through audition.

#### MUAP 3005 - University Orchestra

**Credit Hours:** (1) **Description:** Study and performance of major orchestral literature. Additional opportunities for opera, chamber-orchestral and chamber ensemble performance. Audition required.

1146 **Credit Hours:** (1) **Description:** Study and performance of choral works from broad spectrum of choral literature; sacred, secular, accompanied and a cappella. Open to music majors and non-music majors through audition.

#### MUAP 3007 - Opera Chorus

**Credit Hours:** (1) **Description:** Choral ensemble for opera productions with exploration of related stage techniques. Extra rehearsals at discretion of conductor. Audition required.

#### MUAP 3008 - Oratorio Chorus

**Credit Hours:** (1) **Description:** Study and performance of major works primarily oratorio in nature. Open to music majors, nonmusic majors and the off-campus community. Audition required.

#### MUAP 3012 - Univ Instrumentl Jazz Ensemble

**Credit Hours:** (1) **Description:** Study and performance of varied jazz styles, including repertory from standard big band literature and studio ensembles. Open to music majors and non-majors through audition. This course will meet large ensemble requirements for Music Industry majors only.

#### MUAP 3013 - Univ Voice Jazz Ensemble

**Credit Hours:** (1) **Description:** Study and performance of varied jazz styles, including repertory from standard big band literature and studio ensembles. Open to music majors and non-majors through audition. This course will meet large ensemble requirements for Music Industry majors only.

#### MUAP 3014 - Recording Studio Instr Ensembl

**Credit Hours:** (1) **Description:** Ensemble performs and records works written by students in the Music Industry program. This course will meet large ensemble requirements for Music Industry majors only.

#### MUAP 3015 - Recording Studio Vocal Ensmble

**Credit Hours:** (1) **Description:** Ensemble performs and records works written by students in the Music Industry program. This course will meet large ensemble requirements for Music Industry majors only.

#### MUAP 3016 - Sound Fuzion

**Credit Hours:** (1) **Description:** Preparation and performance of vocal/instrumental music from American popular culture. Repeatable May be repeated for credit. Entrance by audition.

#### **MUAP 3101 - Brass Ensemble**

**Credit Hours:** (1) **Description:** Practical applications of brass performance techniques for a small chamber ensemble, one performer

#### **MUAP 3006 - University Singers**

to a part; survey of brass chamber music. **PREREQUISITE:** permission of instructor.

#### MUAP 3103 - Commercial Music Combo

**Credit Hours:** (1) **Description:** Practical application of basic jazz improvisatory skills; combo experiences in all jazz styles; traditional, bop, contemporary. Audition required.

#### MUAP 3104 - Collegium Musicum

**Credit Hours:** (1) **Description:** Use of early musical instruments and voice in performance of early music; primary sources used in preparation of performances. **PREREQUISITE:** permission of instructor.

#### MUAP 3301 - Chamber Music/Keyboard

**Credit Hours:** (1) **Description:** Collaborative performance for pianist, harpsichordists, and organists with keyboard, brass, winds, strings, percussion, and vocalists; open to students in keyboard concentration and others through audition.

#### **MUAP 3401 - Percussion Ensemble**

**Credit Hours:** (1) **Description:** Study and performance of selected traditional, contemporary, avant garde and pops percussion literature. Open to students in percussion concentration and others through audition.

#### MUAP 3402 - Contemporary Chamber Player

**Credit Hours:** (1) **Description:** Ensemble of mixed and variable instrumentation; performance of repertoire written since 1900 and little known works of other periods. Primary goal of ensemble: to provide experiences in solving unique performance problems of contemporary music. **PREREQUISITE:** permission of instructor.

#### MUAP 3403 - Orff Ensemble

**Credit Hours:** (1) **Description:** Study and performance of literature written for Orff instruments, including barred percussion, unpitched percussion, and recorder.

#### MUAP 3501 - Chamber Music/Strings

**Credit Hours:** (1) **Description:** Study and performance of string chamber music repertory. Coaching sessions weekly with a member of music faculty. Open to music majors and non-majors through audition.

#### MUAP 3503 - Double Bass Ensemble

**Credit Hours:** (1) **Description:** Study and performance of works for bass ensemble. Open to music majors and non-majors through audition.

#### **MUAP 3504 - Guitar Ensemble**

**Credit Hours:** (1) **Description:** Study and performance of works for guitar ensemble. Open to majors and non-majors through audition.

#### MUAP 3505 - Cello Ensemble

**Credit Hours:** (1) **Description:** Study and performance of works for cello ensemble. Open to music majors and non-majors through audition.

#### **MUAP 3506 - Trombone Ensemble**

**Credit Hours:** (1) **Description:** Study and performance of repertory for multiple trombones. Open to music majors and nonmusic majors through audition.

#### MUAP 3507 - Tuba Ensemble

**Credit Hours:** (1) **Description:** A performance based ensemble that addresses significant technical and musical challenges typically not met for the tuba and euphonium in other ensembles. Literature performed in this group consists of serious original compositions for tuba ensemble, transcriptions of orchestral literature, and lighter transcriptions. The ensemble will perform on campus for Octubafest and in the community for Tubachristmas. Other performances include regional, national, and international conferences.

#### **MUAP 3508 - Trumpet Ensemble**

**Credit Hours:** (1) **Description:** Study and performance of works for trumpet ensemble. Open to music majors and non-majors through audition.

#### MUAP 3601 - Chamber Choir

**Credit Hours:** (1) **Description:** Vocal ensemble specializing in choral music from the Renaissance to the present. Open to music majors and non-music majors through audition.

#### MUAP 3602 - Opera Workshop

Credit Hours: (6)

#### MUAP 3603 - Opera Soloists

**Credit Hours:** (1) **Description:** Preparation and performance of role in major production of University Opera Theater. Audition required.

#### MUAP 3604 - Opera Production Lab

Credit Hours: (1-6)

#### **MUAP 3701 - Woodwind Ensemble**

**Credit Hours:** (1) **Description:** Study and performance of original and transcribed works for varied combinations of woodwind instruments. Audition required.

#### **MUAP 3999 - Junior Recital**

**Credit Hours:** (1)

#### **MUAP 4004 - Orchestral Excerpts**

**Credit Hours:** (1) **Description:** Study and performance of selected orchestral excerpts suitable for auditions. Repeatable Up to 3 credit hours **PREREQUISITE:** permission of instructor

#### MUAP 4103 - Jazz/Studio Ensemble Techiques

**Credit Hours:** (3) **Former:** (CMUS) **Description:** Jazz and studio performance styles and practices, emphasizing ensemble rehearsal and conducting techniques, articulation, phrasing, balance and blend, line dominance, and recording studio performance skills. (F) **PREREQUISITE:** MUTC 3828.

#### **MUAP 4111 - Applied Music Trumpet**

**Credit Hours:** (2)

#### **MUAP 4112 - Commercial Music Trumpet**

Credit Hours: (2)

#### MUAP 4121 - Horn

Credit Hours: (2)

#### MUAP 4131 - Trombone

Credit Hours: (2)

#### **MUAP 4132 - Commerical Music Trombone**

**Credit Hours:** (2)

MUAP 4141 - Tuba

Credit Hours: (2)

#### MUAP 4142 - Euphonium

Credit Hours: (2)

MUAP 4151 - Cornett

Credit Hours: (2)

#### MUAP 4161 - Sackbut

Credit Hours: (2)

#### MUAP 4260 - Special Topic in Music

**Credit Hours:** (1-3) **Description:** Topics are varied and in the online class listings.

#### MUAP 4263 - Reed Making

**Credit Hours:** (1) **Description:** Topics are varied and in the online class listings.

#### MUAP 4301 - Acting for Opera I

**Credit Hours:** (3) **Description:** Essential acting techniques for singers, with special attention to application to operatic stage.

#### MUAP 4302 - Acting for Opera II

**Credit Hours:** (3) **Description:** Essential acting techniques for singers, with special attention to application to operatic stage.

#### MUAP 4311 - Piano

Credit Hours: (2)

#### MUAP 4312 - Commercial Music Piano

Credit Hours: (2)

#### MUAP 4321 - Harpsichord

Credit Hours: (2)

MUAP 4331 - Organ

Credit Hours: (2)

**MUAP 4411 - Percussion** 

**Credit Hours:** (2)

#### **MUAP 4412 - Commercial Music Percussion**

Credit Hours: (2)

**MUAP 4414 - Ethnic Percussion** 

Credit Hours: (2)

# MUAP 4511 - Violin

MUAP 4512 - Baroque Violin

Credit Hours: (2)

MUAP 4521 - Viola

Credit Hours: (2)

MUAP 4531 - Cello

Credit Hours: (2)

MUAP 4541 - Bass

**Credit Hours:** (2)

**MUAP 4542 - Commercial Music Bass** 

**Credit Hours:** (2)

MUAP 4551 - Guitar

Credit Hours: (2)

**MUAP 4552 - Commercial Music Guitar** 

Credit Hours: (2)

**MUAP 4561 - Harp** 

**Credit Hours:** (2)

MUAP 4571 - Viola Da Gamba

Credit Hours: (2)

MUAP 4611 - Voice

Credit Hours: (2)

MUAP 4612 - Commercial Music Voice

Credit Hours: (2)

#### MUAP 4711 - Flute

Credit Hours: (2)

MUAP 4721 - Oboe

Credit Hours: (2)

#### MUAP 4731 - Clarinet

Credit Hours: (2)

MUAP 4741 - Saxophone

Credit Hours: (2)

**MUAP 4742 - Commercial Music Saxophone** 

Credit Hours: (2)

MUAP 4751 - Bassoon

Credit Hours: (2)

MUAP 4761 - Recorder

Credit Hours: (2)

**MUAP 4800 - Career Resources for Musicians** 

**Credit Hours:** (3) **Description:** This course provides the opportunity for students to learn how to present themselves and their skills to the public. The course covers career-related writing skills, including biographies, resumes, and grant proposals, in addition to giving students an experiential learning environment to create a practical toolbox for their professional life.

#### MUAP 4801 - Individual Study Applied Music

**Credit Hours:** (1-3) **Description:** Directed individual instruction in applied area not listed under MUAP. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of director.

#### MUAP 4895 - Sr Proj Jazz/Studio Perform

**Credit Hours:** (3) **Former:** (CMUS) **Description:** Project must include live and recorded performances demonstrating the student's mastery of various styles of jazz and popular music performance. **PREREQUISITE:** upper division standing in applied music, MUTC 3827, or permission of instructor.

#### **MUAP 4999 - Artist Recital**

**Credit Hours:** (4) **Description:** Integration course in which knowledge and skills developed in music history, music theory, and applied music courses are utilized systematically in the preparation and presentation of a public musical performance and of an accompanying descriptive paper. Taught as applied music, individual instruction. **PREREQUISITE:** a minimum of 4 hours upper division lessons; permission of the instructor.

#### ARAB 1010 - Elementary Arabic I

**Credit Hours:** (3) **Description:** Principles of pronunciation; everyday expressions; basic sentence patterns through oral practice, writing and reading.

#### ARAB 1020 - Elementary Arabic II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** ARAB 1010 or equivalent.

#### ARAB 2010 - Intermediate Arabic I

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** ARAB 1020 or equivalent.

#### ARAB 2020 - Intermediate Arabic II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice.

#### **ARCH 1111 - Fundamentals of Design Studio**

**Credit Hours:** (3) **Description:** Visual perception, principles and systems of order that inform two and three dimensional design, architectural composition and urban design; basic architectural principles used in design of buildings, interior spaces and sites. **PREREQUISITE:** ARCH 1112, ARCH 1120. **COREQUISITE:** ARCH 1113, ARCH 1211.

#### **ARCH 1112 - Architecture Graphics Studio**

**Credit Hours:** (3) **Description:** Graphic communication principles in architecture; mechanical drawing skills; introduction to digital presentation techniques; architectural modeling; orthographic and paraline projections; graphics reproduction techniques. **PREREQUISITE:** ARCH 1120.

#### **ARCH 1113 - Design Visualization**

**Credit Hours:** (3) **Description:** Freehand drawing skills for designers; perception-based drawing and concept ideation; principles of one and two point perspective; use of light, shade and shadow in representation of architectural forms and spaces. **PREREQUISITE:** ARCH 1112, ARCH 1120. **COREQUISITE:** ARCH 1111, ARCH 1211.

#### ARCH 1120 - Intro to Architecture + Design

**Credit Hours:** (3) **Description:** Fundamental principles of architecture and design; sustainability, historical, cultural, theoretical aspects of architecture and design; architecture and interior design profession values, ethics.

High Impact Practice Code: Study Abroad

#### **ARCH 1211 - History of Architecture 1**

1150 Credit Hours: (3) Description: Major trends in architecture from prehistoric times to Renaissance; emphasis on impact of technological and social changes on prevailing architectural styles. PREREQUISITE: HIST 1110.

#### ARCH 2212 - History of Architecture 2

**Credit Hours:** (3) **Former:** (1212) **Description:** Major trends in architecture from Renaissance to present; emphasis on pre-1900 era; development of architecture through cultural and technological change. **PREREQUISITE:** ARCH 1211 and HIST 1120.

#### **ARCH 2311 - Structural Concepts**

**Credit Hours:** (3) **Description:** Introduction to fundamental principles for the design of structural systems within architecture and design. **PREREQUISITE:** PHYS 2010/PHYS 2011.

#### ARCH 2411 - Building Technology 1

**Credit Hours:** (3) **Former:** (1411) **Description:** Building types and building systems; emphasis on the effect of scale, materials, assembly systems and detail methods upon architectural design; drafting of details included. **PREREQUISITE:** ARCH 1111, ARCH 1112, ARCH 1113, ARCH 1120, ARCH 1211. **COREQUISITE:** ARCH 2212, ARCH 2611, ARCH 2711.

#### ARCH 2412 - Building Technology 2

**Credit Hours:** (3) **Description:** Advanced study of building types and building systems; material and their properties as related to architecture; drafting of details included. **PREREQUISITE:** ARCH 2411. **COREQUISITE:** ARCH 2612, ARCH 2712.

#### ARCH 2611 - Computer Apps in Design 1

**Credit Hours:** (3) **Description:** Computer aided drafting and design applications to produce computer generated architectural design and working drawings. **PREREQUISITE:** ARCH 1111, ARCH 1112, ARCH 1113, ARCH 1120, ARCH 1211. **COREQUISITE:** ARCH 2212, ARCH 2411, ARCH 2711.

#### ARCH 2612 - Computer Apps in Design 2

**Credit Hours:** (3) **Description:** Advanced concepts of computer generated drawings including utilization of third party software for special applications, 3-D building studies, site development. **PREREQUISITE:** ARCH 2611, or equivalent. **COREQUISITE:** ARCH 2412, ARCH 2712.

#### ARCH 2711 - Design Studio 1

**Credit Hours:** (5) **Description:** Projects to introduce architectural precedents, typology, form, space, order, meaning, and place; understanding of specific cultural, social and physical contexts of architecture. **PREREQUISITE:** ARCH 1112. **COREQUISITE:** 

High Impact Practice Code: Study Abroad

#### ARCH 2712 - Design Studio 2

**Credit Hours:** (5) **Description:** Integration of concepts and methods as applied to building types, design, construction, and systems with a focus on regionalism; site analysis and development of design solutions integrating formally expressive visual ideas and functionally adept planning and design concepts. **PREREQUISITE:** ARCH 2711. **COREQUISITE:** ARCH 2412, ARCH 2612.

#### ARCH 3213 - Survey of Interiors+Furniture

**Credit Hours:** (3) **Description:** Major historical periods and trends in the development of interior design and furniture from Renaissance to present; primary emphasis on principles of aesthetic philosophy and design theory. **PREREQUISITE:** ARCH 1211, 2212, or permission of instructor.

#### **ARCH 3221 - Determinants of Modern Design**

**Credit Hours:** (3) **Former:** (4221) **Description:** Significant works of architecture and urban design from 1900 to present; focus on Europe, United States, non-Western world; examination of architecture as a mode of cultural production in relation to its aesthetic. **PREREQUISITE:** ARCH 1211, ARCH 2212, or equivalent.

#### **ARCH 3222 - Contemporary Architecture 1**

**Credit Hours:** (3) **Description:** Examination of relevant works of architecture impacting the world today; focus on conceptual basis of works, theoretical design intent, technical execution and detailing as reinforcement of design intent; impact of significant works on the profession and larger society. **PREREQUISITE:** ARCH 3221

#### ARCH 3312 - Structures 2

**Credit Hours:** (3) **Description:** Fundamentals of structural design and analysis of steel and timber buildings and building components. **PREREQUISITE:** ARCH 2311.

#### ARCH 3313 - Structures 3

**Credit Hours:** (3) **Description:** Fundamentals of structural design and analysis of concrete buildings and building components. **PREREQUISITE:** ARCH 2311.

#### ARCH 3321 - Structural Design 1

**Credit Hours:** (3) **Description:** Introduction to analysis and design of building systems and impact of these systems based on fundamental principles of mechanics; force systems, equilibrium; axial sheer bending stress theory; stress diagrams, buckling, strain and deformation

1151 related to building load requirements of structural systems within architectural forms. **PREREQUISITE:** PHYS 2010/PHYS 2011.

#### ARCH 3322 - Structural Design 2

**Credit Hours:** (3) **Description:** Fundamentals of structural design and analysis of buildings and building components in relationship to material. **PREREQUISITE:** ARCH 3321.

#### **ARCH 3421 - Environmental Systems**

**Credit Hours:** (3) **Description:** Studies in environmental technologies in architecture; mechanical systems, plumbing, electrical and energy conservation. **COREQUISITE:** ARCH 3221, ARCH 3321, ARCH 3613, ARCH 3713.

#### **ARCH 3431 - Professional Practice**

**Credit Hours:** (3) **Description:** Professional services; ethics; building programming; building codes; construction documents; cost estimating. **PREREQUISITE:** permission of instructor.

#### ARCH 3613 - Computer Apps in Design 3

**Credit Hours:** (3) **Former:** (4613) **Description:** Advanced design, modeling, analytical concepts using various computer software programs. **PREREQUISITE:** ARCH 2612, ARCH 2712. **COREQUISITE:** ARCH 3321, ARCH 3421, ARCH 3713.

#### ARCH 3713 - Design Studio 3

**Credit Hours:** (5) **Former:** (3711) **Description:** Integrative design strategies that engage programmatic, contextual, and constructed dimensions of architecture and its representations with a focus on environmental and sustainable issues. **PREREQUISITE:** ARCH 2412, ARCH 2612, ARCH 2712. **COREQUISITE:** ARCH 3221, ARCH 3321, ARCH 3421, ARCH 3613.

High Impact Practice Code: Study Abroad

#### ARCH 3714 - Design Studio 4

**Credit Hours:** (5) **Former:** (3712) **Description:** Integration of design determinants; selection and design of structural systems. environmental systems, materials, and connections for large and small scale buildings. **PREREQUISITE:** ARCH 3221, ARCH 3321, ARCH 3421, ARCH 3613, ARCH 3713. **COREQUISITE:** ARCH 3222, ARCH 3322.

#### **ARCH 4021 - Architecture Independent Study**

**Credit Hours:** (1-3) **Description:** Independent research in selected area of architecture under supervision of architecture faculty. Repeatable May be repeated for a maximum of 6 credit hours. **PREREQUISITE:** permission of instructor. (A-F, IP)

#### ARCH 4022 - Architecture+Urbanism Seminar

**Credit Hours:** (3) **Description:** Review of contemporary concepts in architectural design in context of urban environment; attitudes and phenomena which have led to the making of particular culture of our time and their impact on the built environment. **PREREQUISITE:** permission of instructor.

#### ARCH 4023 - Urban Design Seminar

**Credit Hours:** (3) **Description:** Comprehensive overview of significant issues of contemporary urban design; emphasis on experimental nature of cities; role of the architect in urban design. **PREREQUISITE:** permission of instructor.

#### ARCH 4231 - Issues in City Building

**Credit Hours:** (3) **Description:** Review of historical and contemporary issues in architecture, urban design, planning, and real estate development within the context of urban environment. **PREREQUISITE:** permission of instructor.

High Impact Practice Code: Study Abroad

#### **ARCH 4421 - Sustainable Design**

**Credit Hours:** (3) **Description:** Principles of sustainable design as it relates to architecture and interior design. Topics include successful integration of sustainable design principles into building solutions; systematic evaluation of various design strategies in order to determine the most appropriate application. **PREREQUISITE:** permission of instructor.

#### **ARCH 4430 - Internship in Architecture**

**Credit Hours:** (1-6) **Description:** Experiential learning to be achieved through an approved work assignment with a design firm, appropriate public or private entity, or a Department of Architecture faculty member. **PREREQUISITE:** permission of instructor.

#### **ARCH 4441 - Construction Documents**

**Credit Hours:** (3) **Description:** Construction drawings and specifications; document organization and integration of building systems; graphics conventions; structural, architectural and interior detailing. **PREREQUISITE:** ARCH 3322, ARCH 3613, ARCH 3714. **COREQUISITE:** ARCH 4231, ARCH 4715.

#### ARCH 4451 - Site/Environmental Planning

**Credit Hours:** (3) **Description:** Building sites; selection and utilization, including environmental influences; technical aspects such as zoning, contour lines, parking, ingress/egress, site drainage, building location and sustainable design. **PREREQUISITE:** permission of instructor.

#### ARCH 4510-4519 - Special Topics in Architecture

#### ARCH 4715 - Design Studio 5

**Credit Hours:** (5) **Former:** (4713) **Description:** Assessment, selection, integration of structural systems, building envelop systems, environmental systems, life-safety systems, building service systems into a comprehensive building design. **PREREQUISITE:** ARCH 3714. **COREQUISITE:** ARCH 4231, ARCH 4441.

#### ARCH 4716 - Design Studio 6

**Credit Hours:** (5) **Former:** (4714) **Description:** Issues of urban design; role of architecture in creating livable, sustainable cities; built environment and urban condition. **PREREQUISITE:** ARCH 4715.

#### ARCH 4811 - Parameters Architecture Studio

**Credit Hours:** (3-6) **Description:** Comprehensive overview of differences and relationships of history, technology, and culture in terms of impact on architecture and urban design; concepts of form generation and historic dimensions of architecture with respect to human settlement. Repeatable May be repeated for a maximum of 6 hours credit when topic varies. **PREREQUISITE:** permission of instructor.

#### ARCH 4812 - Furniture Design Studio

**Credit Hours:** (4) **Description:** Examination of historical precedents in modern style and place of furniture in architecture; design philosophy, expression of materials, construction. **PREREQUISITE:** permission of instructor.

#### ARCH 4821 - Urban Design Studio

**Credit Hours:** (6) **Description:** Comprehensive overview of significant issues of contemporary urban design; emphasis on experiential nature of cities, role of public policy, and genesis and development of urban building types. **PREREQUISITE:** permission of instructor.

#### ARCH 4822 - Architecture/Urbanism Studio

**Credit Hours:** (6) **Description:** Advanced design studio for identifying needs, resources, and operational methodologies across an expanded range of environmental scales; methods for identification of socio-cultural needs and coordination of complex variables, information, resources, leading to conceptualization and development of design of components of built environment.

#### ARCH 4823 - Design Collaborative Studio 1

**Credit Hours:** (3-6) **Description:** Critical study of a defined community challenge that incorporates knowledge and skills from a variety of disciplines; conduct best practice research within and across disciplines. The purpose of this course is to support community

engagement activities of the University of Memphis Design Collaborative (UMDC). Repeatable May be repeated for a maximum of 6 credit hours. **PREREQUISITE:** Permission of instructor.

# ARCH 4824 - Design Collaborative Studio 2

**Credit Hours:** (3-6) **Description:** Critical study of a defined community challenge that incorporates knowledge and skills from a variety of disciplines; conduct best practice research within and across disciplines. The purpose of this course is to support community engagement activities of the University of Memphis Design Collaborative (UMDC). Repeatable May be repeated for a maximum of 6 credit hours. **PREREQUISITE:** Permission of instructor.

# ARCH 4825 - Design+Build Studio

**Credit Hours:** (3) **Description:** Collaborative research with faculty, students and community stakeholders; integration of concepts and methods as applied to building types, design, construction; site analysis and development of design solutions for community engagement project(s). May be repeated by permission for a maximum of 6 credit hours. **PREREQUISITE:** Permission of instructor.

# **ARCH 4833 - Architectural Illustration**

**Credit Hours:** (3) **Description:** Basics of phenomenological theory as it applies to design communication; techniques of observational analysis; skills in applied color theory, perspective drawing, compositional refinement, and characteristics of materials and light; precedents of representation; graphic and verbal presentation. **PREREQUISITE:** permission of instructor.

# ARCH 4841 - Studio Study Abroad

**Credit Hours:** (3-9) **Description:** Comparative studies of cultures; relationships of culture to physical environment, organization of cities; history and behavior of inhabitants; analysis and documentation of elements of physical environment and relationship between buildings and urban fabric. **PREREQUISITE:** permission of instructor.

# **ARCH 4930 - Senior Thesis**

**Credit Hours:** (3) **Description:** Study and research in specific area culminating in an integrating experience through individual and/or group projects and technical reports. **PREREQUISITE:** ARCH 4715. (A-F, IP)

# **ARCH 4931 - Senior Thesis Seminar**

**Credit Hours:** (1) **Description:** Study and research in a specific area culminating in an integrating experience through individual project; research techniques, preliminary research and conceptual development of architectural project; site analysis and selection, case studies; development of Thesis proposal. **PREREQUISITE:** permission of instructor.

#### ART 1210 - Foundations Studio I

**Credit Hours:** (3) **Description:** Methods of studio practice including research, creative problem solving, idea development, collaborative operations, integration of digital technology, engagement with readings in contemporary art criticism and historical and critical texts; emphasis on development of independent projects and critical and verbal skill development.

# ART 1215 - Foundations Studio II

**Credit Hours:** (3) **Description:** Exploration of design elements and principles as applied to development of two and three dimensional construction; imaginative and fundamental use of materials in visual problem solving. **PREREQUISITE:** ART 1210.

# ART 1311 - Drawing I

**Credit Hours:** (3) **Former:** (TBR: ARTP 1010) **Description:** Introduction to materials and techniques of basic drawing; study of still life, rendering of the human form including work from skeleton and from female and male nude models to develop perception of line, value, space, and volume; use of contour and gesture.

# ART 1314 - Drawing II

**Credit Hours:** (3) **Former:** (TBR: ARTP 1020) **Description:** Use of basic drawing materials and techniques; analysis and rendering of the human form, still-life, architectural space and landscape; work from skeleton and from female or male models; study of anatomy and proportion; introduction to issues of expression; continued study of perspective; introduction to alternative drawing approaches. **PREREQUISITE:** ART 1311.

# ART 2213 - Typographic Design I

**Credit Hours:** (3) **Description:** Terminology, technology, and design aspects of typography for effective communication. **PREREQUISITE:** ART 1210, ART 1311, ART 1215, ART 1314, and ART 2223 or Permission of Instructor.

# ART 2219 - Visual Thinking

**Credit Hours:** (3) **Description:** Fundamental methods in generating ideas for effective visual communication. **PREREQUISITE:** ART 1210, ART 1311, ART 1215, ART 1314, ART 2223 or Permission of Instructor.

# **ART 2223 - Computer Assisted Graphc Des**

**Credit Hours:** (3) **Description:** Introduction to computer graphic design; overview of technical and aesthetic issues relevant to graphic design profession. **PREREQUISITE:** ART 1210, ART 1311 or Permission of Instructor.

# ART 2305 - Princ Time/Based Media

**Credit Hours:** (3) **Description:** Study of various principles and techniques applied by cinematographers, film editors and designers to plan and produce time-based media; storyboarding and effective use of animation and sound.

#### ART 2331 - Painting I

**Credit Hours:** (3) **Description:** Preliminary course in theory and practice of oil painting. **PREREQUISITE:** ART 1210, ART 1311, or permission of instructor.

#### ART 2351 - Intro to Printmaking

**Credit Hours:** (3) **Description:** Printmaking processes: relief, intaglio, planography, and stencil, focusing on relief and screen printing. **PREREQUISITE:** ART 1210, ART 1311, or permission of instructor.

#### ART 2352 - Intro Intaglio/Lithography

**Credit Hours:** (3) **Description:** Monochrome metal plate intaglio and stone lithography. Intaglio includes etching, engraving, and acquatint; lithography includes crayon, wash, and transfer; emphasis on personal expression. **PREREQUISITE:** ART 1210, ART 1311, or permission of instructor.

# ART 2511 - Sculpture I

**Credit Hours:** (3) **Description:** Introduction to basic materials and techniques of sculpture. **PREREQUISITE:** ART 1215 or permission of instructor.

#### ART 2523 - Ceramics I

**Credit Hours:** (3) **Description:** Introduction to clay and ceramic process; emphasis on thoughtful, purposeful exploration of medium, regarding both pottery vessel and nonvessel object.

# ART 2701 - Photography I

**Credit Hours:** (3) **Description:** Basic techniques and processes of still photography; history and aesthetics of photography as fine art; emphasis on personalized perception and seeing photographically.

# ART 2702 - Photography II

**Credit Hours:** (3) **Description:** Exploration of still photography as means to personal expressive statement and self-discovery; assignments emphasize a broad range of contemporary photographic practice. **PREREQUISITE:** ART 2701 or permission of instructor.

# **ART 3000 - Photography Lab Management**

**Credit Hours:** (1) **Description:** Training in proper photography lab management; after training, class time is devoted to lab management experience.

#### 1154 ART 3210 - Graphic Des Candidacy Review

**Credit Hours:** (1) **Description:** Portfolio submission to the graphic design concentration. Repeatable May be taken up to 2 times. **PREREQUISITE:** ART 1210, ART 1311, ART 1215, ART 1314, and ART 2223 **COREQUISITE:** ART 2213 and ART 2219 S, U, or I.

# ART 3213 - Typographic Design II

**Credit Hours:** (3) **Description:** Advanced problems involving visual organization and typography as an expressive design element. **PREREQUISITE:** ART 2213, ART 2219, ART 2223, and ART 3210 or Permission of Instructor.

# ART 3219 - Image Design

**Credit Hours:** (3) **Description:** Strategies, processes and techniques for integrating verbal and visual messages in graphic communications; illustration and computer imaging. **PREREQUISITE:** ART 2213, ART 2219, ART 2223, and ART 3210 or Permission of Instructor.

#### ART 3222 - Graphic Design Method

**Credit Hours:** (3) **Description:** Emphasis on intellectual processes underlying applied design. **PREREQUISITE:** ART 3213, ART 3219, ART 3227, ART 3210 or Permission of Instructor.

# ART 3227 - Electronic Pre-Press Prod

**Credit Hours:** (3) **Description:** Methods of preparing art for reproduction. **PREREQUISITE:** ART 3213, ART 3219, ART 3210 or Permission of Instructor.

# ART 3301 - Digital Art

**Credit Hours:** (3) **Former:** ART 2301 **Description:** Introduction to computer graphics and its application in field of Art; use of standard hardware and software to solve creative problems; exploration of current issues and computer history.

# **ART 3313 - Drawing And Composition**

**Credit Hours:** (3) **Former:** (2313) **Description:** Problems in visual communication; emphasis on compositional and technical considerations; analytical and objective investigations of organizational problems; use of varied graphic media and methods. **PREREQUISITE:** ART 1311 and ART 1314, or permission of instructor.

# **ART 3314 - Drawing And Concepts**

**Credit Hours:** (3) **Description:** Problems in visual communication; emphasis on personal expression; conceptual and subjective investigation of individual problem-solving strategies; use of varied graphic media and methods. **PREREQUISITE:** ART 2313 or permission of instructor.

#### ART 3332 - Painting II

**Credit Hours:** (3) **Description:** Continuation of ART 2331; still-life, landscape, and portrait painting.

# ART 3351 - Intaglio Printmaking

**Credit Hours:** (3) **Description:** In-depth study of metal plate intaglio printmaking processes: engraving, drypoint, etching, aquatint, and color intaglio; mixed media; emphasizes personal expression. **PREREQUISITE:** ART 2352 or permission of instructor.

# ART 3352 - Lithography

**Credit Hours:** (3) **Description:** In-depth study of lithography in monochrome and color from stone and aluminum plates; mixed media color printing; emphasizes personal expression. **PREREQUISITE:** ART 2352 or permission of instructor.

# ART 3411 - Art for Children

**Credit Hours:** (3) **Description:** Introduction to skills and methods for instructional art programs in studio and art appreciation activities; emphasis on materials and ideas for children's art expression and development.

# ART 3414 - Primary School Art Practicum

**Credit Hours:** (1) **Description:** Observation and art teaching in a local K-4 classroom; campus based seminars. **PREREQUISITE:** Art major and permission of instructor. (S/U).

# ART 3416 - Middle School Art Practicum

**Credit Hours:** (1) **Description:** Observation and art teaching in a local 5-8 classroom; campus based seminars. **PREREQUISITE:** Art major and permission of instructor. (S/U).

# ART 3423 - Art Secondary Schools

**Credit Hours:** (3) **Description:** Studio activities and related art education issues relevant to the artistic development of adolescents; emphasizes multicultural concerns and art evaluation systems. **PREREQUISITE:** ART 3411, ARTH 2101, 2102, or permission of instructor.

# ART 3511 - Sculpture II

**Credit Hours:** (3) **Description:** Problems of sculptural form as expressed in metal, wood, and related materials.

# ART 3512 - Sculpture III

**Credit Hours:** (3) **Description:** Continuation of ART 3511; emphasis on techniques.

#### ART 3522 - Kilns/Glazes/Tech Skill

**Credit Hours:** (3) **Description:** Further development and experimentation with technical skills; firing kilns, glaze preparation, technical and visual research. **PREREQUISITE:** ART 1210, ART 1311, and ART 2523.

#### ART 3524 - Ceramics II

**Credit Hours:** (3) **Description:** Some consideration to fundamental historical and aesthetic aspects peculiar to ceramics as a studio medium. **PREREQUISITE:** ART 3522, or permission of instructor.

#### ART 3701 - Photography III

**Credit Hours:** (3) **Description:** Continuation of ART 2702. Closer examination of several key photographers' work as point of departure for student work; how student work relates to traditions. **PREREQUISITE:** ART 2702, or permission of instructor.

# ART 4010 - 4029 - Special Topics in Art

Description: Topics vary by semester, see online class schedule listing.

#### **ART 4140 - Publication Design**

**Credit Hours:** (3) **Description:** Advanced skills and techniques for design of printed media, including magazine and newspaper design; emphasis on story and page design, graphics, headlines and other display typograpahy; approaches to print design presentation on digital platforms.

#### ART 4169 - Mural Painting as Public Art

**Credit Hours:** (3) **Description:** Fundamental principles of painting in the creation of indoor and outdoor murals; various techniques specific to mural painting and the design and creation of murals.

# ART 4209 - Digitl/Motion Typogrphy

**Credit Hours:** (3) **Description:** Aesthetic and technical issues for effective typographic communication in electronic media; emphasis on relationship of form to content; special consideration of time-based presentation and impact of electronic interface.

# **ART 4211 - Writing/Design Process**

**Credit Hours:** (3) **Description:** Synthesis of verbal and visual problem-solving methods and the use of writing as integral phase of design process. **PREREQUISITE:** ART 3222, 3227, 4220, 3210 or Permission of Instructor.

# **ART 4220 - Print Communication Design**

**Credit Hours:** (3) **Former:** (ART 4221) **Description:** Practical problems in areas of publication, information, corporate and promotional design. **PREREQUISITE:** ART 3213, 3219, 3227, 3210 or Permission of Instructor.

# **ART 4223 - Special Studies/Graphic Des**

**Credit Hours:** (3-12) **Description:** Advanced instruction in electronic imaging, typography, and publication design, 3-dimensional design, corporate and promotional design, or information graphics. Repeatable May be repeated to a maximum of 12 hours when topics vary. **PREREQUISITE:** ART 3222, 3227, 4220, 3210 or Permission of Instructor.

# ART 4224 - History Graphic Design

**Credit Hours:** (3) **Description:** Cultural, theoretical, and stylistic aspects of major movements in the field of graphic design in Europe and America from Industrial Revolution to present. **PREREQUISITE:** ART 3213, ART 3219, ART 3227, and ART 3210 or Permission of Instructor.

#### **ART 4228 - Photography Internship**

**Credit Hours:** (3) **Description:** Practical experience in professional photography or art within approved work environment. Fee (\$90.00) **PREREQUISITE:** ART 2702

#### **ART 4229 - Gallery Internship**

**Credit Hours:** (3) **Description:** Practical experience in professional photography or art within approved professional work environment.

# ART 4230 - Graphic Design Internship

**Credit Hours:** (3) **Description:** Practical experience in visual communication within approved professional work environment. **PREREQUISITE:** ART 4233, ART 4560, ART 4211, ART 4223, and ART 3210 or Permission of Instructor.

# **ART 4233 - Design Practice Studio**

**Credit Hours:** (3-12) **Description:** Work under faculty supervision on projects for institutional and corporate clients; assist in developing publications, exhibits, signage and other graphics, and participate in professional design process from project inception to completion. Repeatable May be repeated for a maximum of 12 hours credit with approval of advisor, but not for the purpose of improving a grade previously earned. **PREREQUISITE:** ART 3222, ART 3227, ART 4220, and ART 3210 or Permission of Instructor.

# ART 4235 - Graphic Design Portfolio

**Credit Hours:** (3) **Description:** Methodology and techniques in graphic design applied to an extended visual communication project; written proposal, preparation of comprehensive layouts and oral/visual

1156 presentation of project. **PREREQUISITE:** ART 4233, ART 4560, ART 4211, ART 4223, and ART 3210 or Permission of Instructor.

#### ART 4314 - Art of the Book

**Credit Hours:** (3) **Description:** Comprehensive study of skills and processes involved on design of traditional and nontraditional book formats; investigation of history of the book, book as aesthetic object and as vehicle for creative expression. **PREREQUISITE:** ART 3313, ART 3314, or permission of instructor.

#### ART 4321 - Drawing and Painting I

**Credit Hours:** (3) **Description:** Advanced drawing and painting methods; emphasis on transparent watercolor. **PREREQUISITE:** ART 3313, or permission of instructor.

#### ART 4322 - Drawing and Painting II

**Credit Hours:** (3) **Description:** Continuation of ART 4321; attention to various mixed media. **PREREQUISITE:** ART 3313, ART 4321, or permission of instructor.

# ART 4331 - Painting III

**Credit Hours:** (3) **Description:** Advanced problems in oil painting, presupposing that student has mastered basic techniques and is ready for a more experimental approach to subject. **PREREQUISITE:** ART 2331, ART 3332 or permission of instructor.

# ART 4332 - Painting IV

**Credit Hours:** (3) **Description:** Continuation of ART 4331; emphasis on development of personal style. **PREREQUISITE:** ART 2331, ART 3332, ART 4331, or permission of instructor.

# ART 4333 - Painting V

**Credit Hours:** (3) **Description:** Continuation of ART 4332; emphasis on development of personal style. **PREREQUISITE:** ART 4332, or permission of instructor.

# ART 4351 - Adv Printmaking I

**Credit Hours:** (3) **Description:** Specialization in one or two printmaking media with emphasis on development of personal imagery and technical skills. **PREREQUISITE:** ART 2351, ART 3351 or ART 3352, or permission of instructor.

#### ART 4352 - Adv Printmaking II

**Credit Hours:** (3) **Description:** Advanced work in one or two printmaking media with continued development of personal imagery and advanced technical skills. **PREREQUISITE:** ART 2351, ART 3351 or ART 3352, and ART 4351, or permission of instructor.

#### ART 4353 - Computer Image Print/Photo I

**Credit Hours:** (3) **Description:** Use of digital imaging in one of several output options including:inkjet printing, lithography, screen printing, etching, silver and non-silver photographic processes; emphasis on personal expression **PREREQUISITE:** a computer course and either ART 2351, ART 2701.

# ART 4354 - Computer Image Print/Photo II

**Credit Hours:** (1-3) **Description:** Advanced project using digital imaging. Proposal for study to be approved in advance; emphasis on personal expression. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** ART 4353, or permission of instructor.

# ART 4410 - Art Educ Independ Study

**Credit Hours:** (1-3) **Description:** Theoretical and pragmatic ideas relevant to teaching of art. Repeatable May be repeated for a maximum of 6 semester hours credit. **PREREQUISITE:** ART 3411, ART 3423, or permission of instructor.

#### **ART 4418 - High School Art Practicum**

**Credit Hours:** (1) **Description:** Observation and art teaching in a local 9-12 classroom; campus based seminars. **PREREQUISITE:** Art major and permission of instructor. (S/U).

# ART 4420 - Alternative Art/Ed Practicum

**Credit Hours:** (1) **Description:** Observation and art education for special populations in local schools, community institutions or clinical settings. Includes campus-based seminars. (S/U).

#### ART 4427 - Method/Materials Art Instruc

**Credit Hours:** (3) **Description:** Curriculum planning, resources, and standards for art program goals, budget, and facilities; current art education philosophy and research. **PREREQUISITE:** Admission to TEP and ART 2414, ART 3416, ART 3423, or permission of instructor.

# **ART 4430 - Community Art Project**

**Credit Hours:** (1) **Description:** Opportunity for art education students to utilize studio and pedagogical knowledge and skills to design and implement collaborative, interdisciplinary, comprehensive community art-based learning opportunities for urban youth. Includes 20 hours of field experience. Students submit a process portfolio documenting their experiences. Repeatable May be repeated for a maximum of 3 hours credit. **PREREQUISITE:** Art Education major and permission of instructor. Students may be required to obtain a background check at students' expense. Must be admitted to Teacher Education Program (TEP).

#### ART 4440 - Analysis of Teaching

**Credit Hours:** (4) **Description:** Advanced methods for art teaching practices in schools. **PREREQUISITE:** admission to TEP.

#### ART 4441 - Art Ed Prof Seminar

**Credit Hours:** (3) **Description:** Analysis and problem solving of art student teaching experience; creation of art teacher's professional portfolio. **PREREQUISITE:** completion of all licensure and degree requirements. **COREQUISITE:** ART 4912.

#### ART 4500 - Web Publishing I: html/CSS

**Description:** Introduction of web design software of Dreamweaver; development of website projects; incoporation of target audience analysis and web usability; presentation of website projects from servers. **PREREQUISITE:** PREREQUISITE: ART 3213, ART 3219, and ART 3210 or Permission of Instructor.

#### ART 4511 - Sculpture IV

**Credit Hours:** (3) **Description:** Advanced work in various sculptural media. **PREREQUISITE:** ART 2511, ART 3511, ART 3512, or permission of instructor.

#### ART 4512 - Sculpture V

**Credit Hours:** (3) **Description:** Continuation of ART 4511; emphasis on personal expression. **PREREQUISITE:** ART 4511, or permission of instructor.

#### ART 4521 - Ceramics III

**Credit Hours:** (3) **Description:** Advanced studies in ceramic process and technique; concentration on development of personal attitudes toward work. **PREREQUISITE:** ART 3524, or permission of instructor.

#### ART 4522 - Ceramics IV

**Credit Hours:** (3) **Description:** Technical competence and the production of ceramic objects reflective of genuinely personal involvement. **PREREQUISITE:** ART 4521, or permission of instructor.

# ART 4526 - Advanced Photojournalism

**Credit Hours:** (3) **Description:** Advanced skills and photojournalism techniques for digital video and still photography.

#### ART 4550 - Web Publishing II: html/CSS

**Credit Hours:** (3) **Description:** Creation and development of website projects; systematic training in writing html codes; focused learning of

cascading style sheet (CSS); final production of a multimedia project. **PREREQUISITE:** ART 4500.

#### **ART 4560 - Interactive Media Design**

**Credit Hours:** (3) **Description:** Introduction to time-based, electronic media in graphic design, impact of electronic interface on visual communication; emphasis on visual design of narrative, commercial and/or educational multimedia presentations on computer. **PREREQUISITE:** PREREQUISITE: ART 3222, 3227, 4220, 4500, 3210 or Permission of Instructor.

#### ART 4621 - Workshop in Art I

**Credit Hours:** (1-3) **Description:** Specific art problems as they apply to individual student; emphasis on basic art concepts and creative experience. **PREREQUISITE:** permission of instructor.

#### ART 4622 - Workshop in Art II

**Credit Hours:** (1-3) **Description:** Continuation of ART 4621, providing study of problems appropriate to need of individual student. **PREREQUISITE:** permission of instructor.

#### ART 4641 - Study and Travel in Art

**Credit Hours:** (3-6) **Description:** Travel to important art areas of world and specialized study under direction of faculty member of Department of Art.

#### **ART 4650 - Profess Art Practices**

**Credit Hours:** (3) **Description:** Development of skills needed for success as practicing professional artist; portfolio preparation and presentation, marketing, contracts, copyrights, and alternative art careers. **PREREQUISITE:** Studio Arts or Photography concentration, or permission of instructor. **COREQUISITE:** ART 4990.

# **ART 4701 - Color Photography**

**Credit Hours:** (3) **Description:** Exploration of photographic perception in color; survey of history and aesthetics of color photography; techniques of color photography; emphasis on color printing. **PREREQUISITE:** ART 3701, junior standing, or permission of instructor.

#### **ART 4702 - Photographic Material/Process**

**Credit Hours:** (3) **Description:** Advanced technical course exploring creative potential in various contemporary photography materials, processes and techniques; emphasis on aesthetic application of those materials and techniques. **PREREQUISITE:** ART 3701, or permission of instructor.

1158 **Credit Hours:** (3) **Description:** Exploration of creative potential of archaic and non-traditional photographic processes such as Cyanotype, Gum Bichromate and Kwik-Print. **PREREQUISITE:** ART 3701, or permission of instructor.

#### **ART 4704 - Photographic Lighting**

**Credit Hours:** (3) **Description:** Advanced theory, technique, and equipment used by professional photographers for black and white and color; emphasis on aesthetic application in actual practice. **PREREQUISITE:** ART 3701, or permission of instructor.

#### ART 4705 - Video for Artists

**Credit Hours:** (3) **Description:** Digital video art production with a focus on history of video art and personal expression.

#### ART 4711 - Adv Photography Seminar

**Credit Hours:** (1-3) **Description:** Creation of a unified body of photographic work based on subject matter or formal problem. Contract for study project to be approved by instructor in semester prior to registration. Repeatable May be repeated for a maximum of 6 semester hours credit. **PREREQUISITE:** ART 3701, or permission of instructor.

#### **ART 4712 - Photography Portfolio Seminar**

**Credit Hours:** (1-3) **Description:** Creation and production of bound book or portfolio containing student's photographs and written introduction. Contract for study project to be approved by instructor in semester prior to registration. Repeatable May be repeated for a maximum of 6 semester hours credit. **PREREQUISITE:** ART 4711, or permission of instructor.

#### **ART 4912 - Art Education Residency II**

**Credit Hours:** (9) **Description:** Implementing various methodologies, assessing students, classroom management, and classroom discipline. **PREREQUISITE:** admission to TEP.

#### **ART 4914 - Art Education Residency I**

**Credit Hours:** (5) **Description:** Implementing various methodologies, assessing students, classroom management, classroom discipline. **PREREQUISITE:** admission to TEP.

#### **ART 4920 - Information Design**

**Credit Hours:** (3) **Description:** Visual and visual-rhetorical techniques for information design involving time, process, value, site-specific, and statistical visualization.

#### **ART 4990 - Senior Thesis Preparation**

# **ART 4703 - Alternative Photogrphc Process**

**Credit Hours:** (3) **Description:** Process of integrating advanced knowledge of one or more studio fields, and one or more areas of historical or contemporary art interests. Students will meet regularly with a committee of faculty to receive input and direction regarding the progress of the development of a body of work. The course will include group critiques, reading assignments, research discussion. **COREQUISITE:** ART 4650.

#### **ART 4995 - Senior Thesis Exhibition**

**Credit Hours:** (3) **Description:** Planning and execution of Thesis Exhibition. **PREREQUISITE:** ART 4990.

#### **ARTH 2000 - Introduction to Egyptology**

**Credit Hours:** (3) **Description:** This course will provide a general introduction to the academic discipline of Egyptology and an overview of the culture of ancient Egypt itself. Students will broaden their cultural perspective on the ancient world through an understanding of the major artistic, religious, and textual developments in Egypt, with select discussion of their influence on contemporary and later cultures.

#### ARTH 2010 - World Art I

**Credit Hours:** (3) **Former:** (2101) **Description:** Development of visual arts from prehistoric times through medieval period, their use by man as social, cultural, and educational force; brief survey of art of Far East. **[G]** 

#### ARTH 2020 - World Art II

**Credit Hours:** (3) **Former:** (2102) **Description:** Continues World Art I; development of visual arts from medieval period through Renaissance to present. **[G]** 

#### ARTH 2030 - Visual Studies/Indigenous Arts

**Credit Hours:** (3) **Description:** Arts and visual cultures of peoples of Africa, Oceania, and Native North America.

#### ARTH 4030-4039 - Special Topics in Art History

Description: Topics vary by semester, see online class schedule listing.

#### ARTH 4111 - Art/Archaeology of Egypt

**Credit Hours:** (3) **Description:** Predynastic to Late Period. **PREREQUISITE:** ARTH 2010 or permission of instructor.

#### ARTH 4112 - Egypt Art-Old Kingdom

**Credit Hours:** (3) **Description:** Art, architecture, and archaeology, 3000-1500 B.C. **PREREQUISITE:** ARTH 2010, or permission of instructor.

**Credit Hours:** (3) **Description:** Art, architecture, and archaeology, 1500 B.C.-642 A.D. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### ARTH 4119 - Late Antique/Islamic Art/Egypt

**Credit Hours:** (3) **Description:** Pharaonic and Hellensitic roots of Coptic Art, its 3rd and 4th century AD flourishing, place within the larger milieu of the Byzantine Empire's culture and artistic expression, interaction with the Late Antique arts of the Eastern Mediterranean, and influence on the Islamic Art of Egypt.

#### **ARTH 4121 - Ancient Art Near East**

**Credit Hours:** (3) **Description:** Architecture, sculpture, painting, and the minor arts in Mesopotamia, Anatolia, and Syria Palestine. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### ARTH 4123 - Greek Art

**Credit Hours:** (3) **Description:** Architecture, sculpture and painting from the Bronze Age to the end of the Hellenistic period.

#### ARTH 4124 - Roman Art

**Credit Hours:** (3) **Description:** Architecture, sculpture and painting from Etruscan Rome to the fall of the Empire.

#### ARTH 4125 - Art/Archaeology Pompeii

**Credit Hours:** (3) **Description:** Pompeii's excavations, art, artifacts and architecture in reconstructing ancient Roman daily life.

#### **ARTH 4129 - Ancient/Medieval Architecture**

**Credit Hours:** (3) **Description:** Selected topics comparing the architecture of ancient Egypt, the Classical world, and Medieval Europe. **PREREQUISITE:** ARTH 2010.

#### ARTH 4130 - Art/Medieval World

**Credit Hours:** (3) **Description:** Architecture, sculpture, and painting, including manuscript illumination of the middle ages; Western European and Byzantine traditions. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### ARTH 4131 - Art/Early Middle Ages

**Credit Hours:** (3) **Description:** Advanced study of architecture, sculpture and painting of the early medieval period. **PREREQUISITE:** ARTH 2010, or permission of instructor.

# ARTH 4134 - Art/High Middle Ages

**Credit Hours:** (3) **Description:** Advanced study of architecture, sculpture and painting, including manuscript illumination, ivories and stained glass in the Romanesque and Gothic periods. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### **ARTH 4141 - Early Renaissance Italy**

**Credit Hours:** (3) **Description:** Architecture, sculpture and painting of Italy, 1300-1510. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### **ARTH 4142 - North Renaissance Art**

**Credit Hours:** (3) **Description:** Fifteenth Century Art in Northern Europe; emphasis on panel painting, manuscript illumination and printmaking. **PREREQUISITE:** ARTH 2010, or permission of instructor.

#### ARTH 4143 - High Renaissance Italy

**Credit Hours:** (3) **Description:** Sixteenth Century Art in Italy; highlights works of Michelangelo, Raphael, Titian, and the Mannerists. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4146 - Baroque Art

**Credit Hours:** (3) **Description:** Architecture, sculpture, and painting produced in Europe during Seventeenth Century. **PREREQUISITE:** ARTH 2020 or permission of instructor.

#### ARTH 4148 - Neo-Class/Romanticism

**Credit Hours:** (3) **Description:** Western European art, ca. 1760-1850 emphasizing painting, sculpture, and art theory. **PREREQUISITE:** ARTH 2020,or permission of instructor.

#### ARTH 4149 - Realism & Impressionism

**Credit Hours:** (3) **Description:** Western European art, ca. 1850-1880, emphasizing painting, sculpture and art theory. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4152 - Early Modern Art

**Credit Hours:** (3) **Description:** Movements in Western art and art theory, 1880-1905 which are the foundation of 20th century modernism, Symbolism and Post-Impressionism. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### **ARTH 4153 - Cubism through Surrealism**

**Credit Hours:** (3) **Description:** History of avant-garde art before World War II. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4155 - High Modern Art

**Credit Hours:** (3) **Description:** American and European art and art theory 1940-1968, emphasizing the development of modernism. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4157 - Contemp Art/Theory/Criticism

**Credit Hours:** (3) **Description:** Historical movements, theory and criticism: 1968 to present. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4158 - Modern Architecture

**Credit Hours:** (3) **Description:** Survey of 19th century styles, 20th century masters, and contemporary developments in architecture; historic preservation.

#### **ARTH 4160 - Architecture and Nature**

**Credit Hours:** (3) **Description:** Survey and analysis of spaces in a variety of cultures from world history where the relationship between the natural and the built environment is healthy.

#### **ARTH 4162 - Latin American Art**

**Credit Hours:** (3) **Description:** Hispanic arts of the Americas from 1500 to the present in relation to Iberian and Indian traditions.

#### ARTH 4163 - Pre-Columbian Art

**Credit Hours:** (3) **Description:** Ancient art of Mexico, Central America and South America from about 1000 B. C. to European contact.

#### ARTH 4166 - American Art: 1500s-1940s

**Credit Hours:** (3) **Former:** History of American Art **Description:** American art examined in social, cultural and historical contexts; broad range of creative expression, including fine arts, architecture, folk art, film, furniture, popular culture; covers the period of conquest to modern developments. **PREREQUISITE:** ARTH 2020, or permission of instructor.

#### ARTH 4167 - American Art, 1860-1945

**Description:** This course will examine art and visual culture produced in the United States between two defining conflicts in U.S. history: the Civil War and World War II. We will approach the issue of defining a national art from multiple perspectives, including dominant and marginalized voices. We will also consider the changing nature of what art could resemble, who could produce it, and the groundbreaking artists and exhibitions that shaped the course of American art during this period.

#### ARTH 4168 - Art/Soc Conflict USA 1920-Pres

**Credit Hours:** (3) **Description:** Social conflicts and political controversies in American culture through the lens of visual culture including art, photography, and popular media.

#### ARTH 4181 - Arts Africa/Oceania/N America

**Credit Hours:** (3) **Description:** Survey of the arts created by native Americans of U.S. and Canada, peoples of sub-Saharan Africa and Pacific islands, examined in relation to their cultural context and heritage.

#### ARTH 4183 - Visual Arts of Africa

**Credit Hours:** (3) **Description:** Survey of the arts of the African continent from pre-historic to the modern era; African aesthetic traditions in relation to social and cultural contexts.

#### **ARTH 4185 - African American Art**

**Credit Hours:** (3) **Description:** Introduction to African American visual expression and culture from Colonial to the modern era, including fine arts, photography, film and popular culture.

#### **ARTH 4195 - Proseminar Art History**

**Credit Hours:** (3) **Description:** Investigation of selected topics in art history with emphasis on development of research techniques and methodologies. Oral presentation and writing of thesis paper. **PREREQUISITE:** senior status with 18 semester hours in art history.

#### ARTH 4197 - Adv Indiv Research/ARTH

**Credit Hours:** (3) Repeatable May be repeated for credit when topic varies. **PREREQUISITE:** permission of instructor.

#### **ARTH 4230 - Art History Internship**

**Credit Hours:** (3) **Description:** Practical experience within approved professional work environment. Must be pre-approved by advisor. Repeatable May be repeated

#### **ARTH 4381 - Art Curatorial Techniques**

**Credit Hours:** (3) **Description:** Curatorial responsibilities and functions: receiving and shipping methods, registration, physical and environmental security, research, conservation, and study of art market and publications.

#### **ARTH 4386 - Introduction to Museums**

**Credit Hours:** (3) **Description:** History of museums and how they function in society; development of major collections and roles of museums as centers of research, education, and as interpreters of social

values; presentations by museum professionals and visits to area museums. *Cross listing:* (Same as HIST 4386).

#### **ARTH 4660 - Museum Collections**

**Credit Hours:** (3) **Description:** Theory, methods, collection policy, development, preservation, documentation, interpretation of museum collections. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ANTH 4660)

#### **ARTH 4661 - Collections Research**

**Credit Hours:** (3)

#### **ARTH 4662 - Museum Exhibitions**

**Credit Hours:** (3) **Description:** Exhibition methods and theory, including research, design, layout, object selection and handling, installation, public programming and evaluation. Repeatable May not be repeated for credit. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ANTH 4662)

#### ARTH 4721 - History Photography I

**Credit Hours:** (3) **Description:** Survey of history and theory of photography since its invention in the 19th century.

#### ARTH 4722 - History Photography II

**Credit Hours:** (3) **Description:** Historical and critical issues in photography from World War I to the present.

#### BIOL 1010 - Biology of Cells\*\*

**Credit Hours:** (3) **Description:** General overview of cellular structure and function, genes and biodiversity. NOTE: credit will not apply toward a major or minor in the sciences, nor will it satisfy any part of science requirements for preprofessional curricula. Three lecture hours per week. **[G]** 

#### BIOL 1011 - Biology of Cells Lab \*\*

**Credit Hours:** (1) **Description:** Explores principles and applications of basic biology through laboratory experiments, observations and demonstrations; emphasis on cellular structure, function and diversity and on introductory genetics. Fee Lab Fee: \$20. NOTE: credit will not apply toward a major or minor in the sciences, nor will it satisfy any requirements for pre-professional curricula. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 1010. **[G]** 

#### BIOL 1020 - Biology of Organisms\*\*

**Credit Hours:** (3) **Description:** General overview of life; emphasis on structure and function of organisms and biosphere. NOTE: credit will not apply toward a major or minor in the sciences, nor will it satisfy any part of science requirements for pre-professional curricula. BIOL the location of science and lindex pho

1010 is not a prerequisite for this course. Three lecture hours per week. **[G]** 

# BIOL 1021 - Biology of Organisms Lab \*\*

**Credit Hours:** (1) **Description:** Laboratory observations, demonstrations and experiments designed to apply scientific methods to lecture subjects. Fee Lab Fee: \$20. NOTE: Credit will not apply toward a major or minor in the sciences, nor will it satisfy any requirements for pre-professional curricula. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 1020. **[G]** 

#### **BIOL 1110 - General Biology I**

**Credit Hours:** (3) **Description:** Unifying principles of biology with emphasis on cell structure, cell function, heredity, development and evolution. NOTE: course designed for students majoring in the natural sciences or pursuing a preprofessional program. Three lectures hours per week. **PREREQUISITE:** CHEM 1110. **PREREQUISITE or COREQUISITE:** BIOL 1111. **[G]** 

#### **BIOL 1111 - General Biology I Lab**

**Credit Hours:** (1) **Description:** Investigative laboratories in introductory cell and molecular biology with emphasis on experimental theory and design, practical laboratory skills; interpretation of data; documentation and communication of laboratory work. Fee Lab Fee: \$20 NOTE: course designed for students majoring in the natural sciences or pursuing a pre-professional program. Three laboratory hours per week **PREREQUISITE:** CHEM 1110. **PREREQUISITE or COREQUISITE:** BIOL 1110. **[G]** 

#### **BIOL 1120 - General Biology II**

**Credit Hours:** (3) **Description:** Continuation of BIOL 1110 with emphasis on origin and diversity of life; structure, functions, and ecology of organisms. NOTE: course designed for students majoring in the natural sciences or pursuing a preprofessional program. Three lecture hours per week. **PREREQUISITE:** BIOL 1110. **PREREQUISITE or COREQUISITE:** BIOL 1121. **[G]** 

#### **BIOL 1121 - General Biol II Lab**

**Credit Hours:** (1) **Description:** Laboratory observations, demonstrations and experiments designed to apply scientific methods to lecture subjects. **PREREQUISITE or COREQUISITE:** BIOL 1120.

#### BIOL 1230 - Microbiology \*\*

#### **Credit Hours:** (3) **Former:** (MMCS 1230) **Description:** Microorganisms and their basic characteristics, with emphasis on relationship to pathogenesis and disease prevention. NOTE: credit will not apply toward a major or minor in the sciences. Three lecture hours per week.

#### BIOL 1231 - Microbiology Lab \*\*

**Credit Hours:** (1) **Former:** (MMCS 1231) **Description:** Skills essential for clinical microbiological labs including aseptic technique, microscopy, use of common media, staining techniques, and differentiation of bacteria based on biochemical characteristics for bacterial identification. Fee Lab: \$25. NOTE: credit will not apply toward a major or minor in the sciences. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 1230.

#### BIOL 2010 - Anatomy/Physiology I\*\*

**Credit Hours:** (3) **Description:** Detailed study of structure and functions of human organism; credit not acceptable for Biology major or minor. Three lecture hours per week. **[G]** 

High Impact Practice Code: Study Abroad

# BIOL 2011 - Anat/Physiology I Lab \*\*

**Credit Hours:** (1) **Description:** Laboratory observations, demonstrations and experiments designed to help students develop a working knowledge of anatomy and physiology. Topics covered are anatomical terminology, genetics, and the integumentary, skeletal, muscular, and nervous systems. Fee Lab Fee: \$25. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 2010. **[G]** 

High Impact Practice Code: Study Abroad

# BIOL 2020 - Anatomy/Physiology II\*\*

**Credit Hours:** (3) **Description:** Continuation of BIOL 2010; credit not acceptable for Biology major or minor. Three lecture hours per week. **[G]** 

# BIOL 2021 - Anat/Physiology II Lab \*\*

**Credit Hours:** (1) **Description:** Laboratory observations, demonstrations and experiments designed to help students develop a working knowledge of anatomy and physiology. Topics covered are the special senses, and the circulatory, cardiovascular, respiratory, digestive, urinary, and reproductive systems. Fee Lab Fee: \$25. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 2020. **[G]** 

# **BIOL 3050 - Ecology**

**Credit Hours:** (4) **Description:** Relationships between organisms and their environment; emphasis on fundamental principles and modern perspectives; topics include: nutrient cycles, limiting factors, population dynamics, community dynamics, succession, species interactions, urban ecology; quantitative and field methods also covered. Three lecture hours, three lab hours per week. Additional field trips will be scheduled outside of class hours. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 3072 - Genetics**

**Credit Hours:** (3) **Description:** Principles of heredity, including classical, microbial, molecular, and population genetics. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 or BIOL 3500.

#### **BIOL 3073 - Genetics Laboratory**

**Credit Hours:** (1) **Description:** Laboratory experiments in classical, microbial, molecular, and population genetics designed to illustrate principles of heredity. Fee Lab Fee: \$25. Three laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 3072 or equivalent.

# **BIOL 3130 - Cell Biology**

**Credit Hours:** (3) **Former:** (MMCS 3130) **Description:** Introduction to principles of cell and molecular biology as they relate to eukaryotic cells with emphasis on functions common to most cell types. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 3200 - General Botany**

**Credit Hours:** (4) **Description:** Structure, function and diversity of plants. Fee Course Fee: \$20. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 3500 - Micro I/Fundmntl Aspect**

**Credit Hours:** (3) **Former:** (MMCS 3500) **Description:** Origins, composition, structure, growth, genetics, genomics of viruses and microorganisms. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121and CHEM 1120.

#### **BIOL 3505 - Gen Microbiology Lab**

**Credit Hours:** (2) **Former:** (MMCS 3600) **Description:** Essential microbiological laboratory skills such as aseptic technique, microscopy, and bacterial culture and characterization. Four laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 3500.

#### BIOL 3550 - Micro II/Med/Appl Aspct

**Credit Hours:** (3) **Former:** (MMCS 3550) **Description:** Bacterial diversity, associations including symbiosis, pathogenesis, micro- to planetary scale ecology; microbial biotechnology. Three lecture hours per week. **PREREQUISITE:** BIOL 3500.

# **BIOL 3620 - Comp Anatomy of Vertebrts**

**Credit Hours:** (5) **Description:** Origin, development, structure, and functions of organs and systems of selected forms of vertebrates. Fee Course Fee: \$35. Two lecture hours, six laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 3730 - Vertebrate Physiology**

**Credit Hours:** (4) **Description:** Normal function of the organ systems of vertebrates, with an emphasis on mammals. Fee Course Fee: \$30. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4000 - Research I**

**Credit Hours:** (1-3) **Description:** Consultation, reading, and laboratory and/or field work in a selected area of biology under supervision of faculty member. Regular attendance at weekly departmental seminar is required. No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements. Repeatable BIOL 4000 and BIOL 4001 may be repeated for a combined total of up to 9 hours credit. **PREREQUISITE:** BIOL 1120 and BIOL 1121. (S/U)

#### BIOL 4001 - Research II

**Credit Hours:** (2-3) **Description:** A continuation of the laboratory and/or field project initiated in BIOL 4000 under supervision of the same faculty member; formal paper and presentation of research results at a professional meeting or departmental seminar required. No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements. Repeatable BIOL 4000 and BIOL 4001 may be repeated for a combined total of up to 9 hours credit. **PREREQUISITE:** BIOL 4000 (S/U)

# **BIOL 4004 - Readings in Modern Biology**

**Credit Hours:** (2) **Description:** Reading and critically evaluating scientific literature, and communicating scientifically. Original research articles on cutting edge topics will be analyzed in depth. Focus on major advances in cell and molecular biology and issues that arise as a result of those advances. Topics may include gene editing, new cancer therapies, antibiotic resistance, and the role of the microbiome in human health. Two lecture hours per week. na **PREREQUISITE:** BIOL 3130 or permission of instructor.

# BIOL 4049 - Marine Ecology Lab

**Credit Hours:** (2) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Laboratory for BIOL 4051 **PREREQUISITE:** Four semesters of science or permission of instructor. **COREQUISITE:** BIOL 4051

# **BIOL 4051 - Marine Ecology**

**Credit Hours:** (5) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Relationship of marine organisms to environment includes effects of temperature, salinity, light, nutrient concentration, currents,

food, predation and competition on the abundance and distribution of marine organisms. **PREREQUISITE:** 16 hours of biology including general zoology, general botany, and invertebrate zoology.

#### **BIOL 4053 - Plant Ecology**

**Credit Hours:** (4) **Description:** Relationships of plants and environmental factors at physiological, population, and community scales; study of ecosystem dynamics at local and landscape scales; emphasis on field techniques. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4054 - Wetland Ecology**

**Credit Hours:** (4) **Description:** Study of wetlands and wetland resources; attributes of hydrology, biogeochemistry and wetland plants with emphasis on bottomland hardwood forests. Fee Course Fee: \$20. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 3050 and permission of instructor.

#### **BIOL 4055 - Ecology/Environment Iss**

**Credit Hours:** (3) **Description:** Ecological perspective on current environmental issues such as conservation and biodiversity, global climatic change, regulation of chemicals in environment. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4056 - Tropical Ecology**

**Credit Hours:** (4) **Description:** Lecture and field intensive course in ecology of the tropics. International travel required for laboratory portion of course. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4065 - Biodiversity**

**Credit Hours:** (3) **Description:** Survey of Earth's biodiversity – the variety of life on Earth – on ecological and evolutionary timescales, focused on primary scientific literature; numbers and kinds of organisms; processes that create and maintain biodiversity; distribution of biodiversity on Earth; extinction; how/where biodiversity is threatened; importance of biodiversity to humans; wilderness, conservation and future of biodiversity. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 or BIOL 3500, or permission of instructor.

#### **BIOL 4071 - Human Genetics**

**Credit Hours:** (3) **Description:** Genetic principles as applied to humans, including pedigree analysis, genetic counseling, cancer, genomics. Three lecture hours per week. **PREREQUISITE:** BIOL 3072.

# BIOL 4090-4099 - Special Topics in Biology

**Description:** Topics are varied.

**Credit Hours:** (3) **Description:** Synthesis of principles and concepts of modern evolutionary theory; geologic evolution, biological evolution, and evolution of societies; emphasis on recent developments and current controversies. Three lecture hours per week. **PREREQUISITE:** BIOL 3072.

#### **BIOL 4110 - Science of Medicine**

**Credit Hours:** (3) **Description:** Integration of fundamental principles from physics, chemistry, biology, and mathematics; application of these principles to solve problems in medicine. **PREREQUISITE:** CHEM 1120, BIOL 1120, PHYS 2120 or permission of instructor. *Cross listing:* (Same as BIOM 4110)

#### **BIOL 4150 - Developmental Biology**

**Credit Hours:** (3) **Former:** (MMCS 4150) **Description:** Introduction to study of developing biological systems at cellular and molecular level. Three lecture hours per week. **PREREQUISITE:** BIOL 3072 and CHEM 3511.

#### **BIOL 4200 - Marine Botany**

**Credit Hours:** (4) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Local examples of principal groups of marine algae and maritime flowering plants, treating structure, reproduction, distribution, identification and ecology. **PREREQUISITE:** ten hours of biology, including introductory botany.

# **BIOL 4230 - Plant Physiology**

**Credit Hours:** (3) **Former:** (3230) **Description:** Whole plant functioning and plant responses to environmental stresses and pollution. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121, or permission of instructor.

# BIOL 4241 - Biogeog/GIS Analyses/Ecology

**Credit Hours:** (3) **Description:** Basic principles of interaction between geography, organism diversity and evolution; physical factors limiting species distribution, theories of island biogeography, geographical modes of speciation. Laboratories introduce principles of GIS, basic functions of ArcGIS, and other programs relevant to ecological studies. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121, or permission of instructor. *Cross listing:* (Same as ESCI 4241).

# **BIOL 4245 - Plant Systematics/Evolution**

**Credit Hours:** (4) **Description:** Evolution and classification of flowering plants, Angiosperms; diversity of flowering plants on worldwide basis; relationship of major flowering plant families;

systems of classification, nomenclature, field collecting techniques, preparation of specimens, family characteristics. Laboratories include practical aspects of flowering plant classification and identification. Three lecture hours and three laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121, or BIOL 3200, or permission of instructor.

#### **BIOL 4300 - Microbial Physiology**

**Credit Hours:** (3) **Former:** (MMCS 4300) **Description:** Cell structure and function; biosynthesis, degradation and metabolic regulation; regulation of growth. Three lecture hours per week. **PREREQUISITE:** BIOL 3500 and CHEM 3511.

# **BIOL 4320 - Biology of Stem Cells**

**Credit Hours:** (3) **Description:** Theoretical and application based approaches to embryonic and adult stem cells. Topics include cloning, cellular reprogramming, regenerative medicine, cancer stem cells, and the ethics of stem cell research. Course will survey modern methods for isolation, culture, and application of stem cells in research and medicine. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 and BIOL 3072 or permission of instructor.

# **BIOL 4375 - Molec Biol/Parasite**

**Credit Hours:** (4) **Former:** (MMCS 4375) **Description:** Parasites with emphasis on molecular and immunological aspects of their biology; parasites of humans emphasized with some examples of parasites of companion animals and livestock; biology, treatment and prevention of parasitic diseases Three lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 3130 or BIOL 3550.

#### **BIOL 4380 - Vertebrate Histology**

**Credit Hours:** (3) **Description:** Vertebrate (human emphasis) tissues and organs; cellular and extracellular microscopic composition in relation to physiology and disease. Three lecture hours per week. **PREREQUISITE:** BIOL 3130

#### **BIOL 4401 - Plant Cell Molec Biol**

**Credit Hours:** (3) **Former:** (MMCS 4400) **Description:** The cellular and molecular basis of plant development, including plant hormones, signal transduction, regulation by light, plant-microbe interactions and plant transformation. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 and BIOL 3072.

# **BIOL 4440 - Pathogenic Bacteriology**

**Credit Hours:** (3) **Former:** (MMCS 4440) **Description:** Unifying concepts in bacterial pathogenesis, with emphasis on molecular aspects of pathogenesis and modern approaches to pathogenesis research; introduction to immunology; human microbiota and opportunistic pathogens; pathogen evolution; virulence factor regulation, delivery, and mechanism; antibiotics and antibiotic resistance; vaccination.

1165 Three lecture hours per week. **PREREQUISITE:** BIOL 3550 and CHEM 3511.

#### **BIOL 4445 - Immunology**

**Credit Hours:** (3) **Former:** (MMCS 4445) **Description:** Antigens, immunoglobulin classes, cells and cytokines of immune response, complement system, hypersensitivities, blood groups, vaccines and immunity. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 or BIOL 3550 and CHEM 3511.

#### **BIOL 4450 - Microbial Ecology**

**Credit Hours:** (3) **Former:** (MMCS 4450) **Description:** Roles of microorganisms in the environment; microbial processes, interactions with the environment and biota, population ecology, community ecology, and biodegradation. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 or BIOL 3500.

#### BIOL 4465 - Adv Medical Micro Lab

**Credit Hours:** (2) **Former:** (MMCS 4465) **Description:** Application of modern laboratory techniques and instrumentation to experiments in pathogenic bacteriology, immunology, virology and parasitology. Four laboratory hours per week. **PREREQUISITE:** BIOL 3505 and BIOL 3500.

#### BIOL 4470 - Molecular Biology of the Gene

**Credit Hours:** (3) **Former:** (MMCS 4470) **Description:** Theoretical and application based approaches to molecular biology and regulation of gene expression. Course surveys modern methods in research and medicine. Stem cells and cancer cells used as model systems to understand changes in gene regulation at the level of genome, transcriptome, and proteome. Three lecture hours per week. **PREREQUISITE:** BIOL 3072 or permission of instructor.

#### BIOL 4480 - Cellular/Molec Pharm

**Credit Hours:** (3) **Description:** Study of mechanisms by which therapeutic agents regulate physiological function of cells comprising organ systems such as heart and central nervous system; drug action (pharmacodynamics) at the molecular, cellular and organ level; common diseases affecting a system. **PREREQUISITE:** CHEM 1120, BIOL 3130.

# **BIOL 4490 - Intro Genomics/Bioinformatics**

**Credit Hours:** (3) **Description:** Survey of modern genomics and bioinformatics approaches used to gain a deeper understanding of biological systems; brief review of basic chemistry, molecular and evolutionary biology; experimental and bioinformatics methods for predicting RNA folding, generating and analyzing genome-scale DNA sequence data, and performing functional genomics analyses of gene expression, DNA methylation, and chromatin immunoprecipitation data; real-world applications of genomics and bioinformatics in medicine and agriculture. Three lecture hours per week.

**PREREQUISITE:** BIOL 3130 and BIOL 3072, or permission of instructor.

# **BIOL 4500 - Marine Microbiology**

**Credit Hours:** (5) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Role of microorganisms in overall ecology of oceans and estuaries. **PREREQUISITE:** general microbiology and environmental microbiology, or permission of instructor.

# **BIOL 4501 - Virology**

**Credit Hours:** (3) **Former:** (MMCS 4501) **Description:** Introductory study of viruses of human and veterinary significance and methods of cultivation, isolation and characterization; study of pathogenic mechanisms. Three lecture hours per week. **PREREQUISITE:** BIOL 3130, BIOL 3500, or BIOL 3550.

# BIOL 4503 - Lab Tech In Biochem

**Credit Hours:** (2) **Former:** (MMCS 4503) **Description:** Biochemical techniques, analysis and design strategies; properties of protein/enzymes, including binding, catalysis, kinetics, electron and proton transport processes of intermediate metabolism; purification, characterization and assay of enzymes using chromatography, spectroscopy and electrophoresis. Fee Lab Fee: \$50 Six laboratory hours per week. **PREREQUISITE:** CHEM 3501. **PREREQUISITE or COREQUISITE:** BIOL 4511 or CHEM 4511. *Cross listing:* (Same as CHEM 4501)

# BIOL 4504 - Lab Tech Molecular Biol

**Credit Hours:** (2) **Former:** (MMCS 4504) **Description:** Biochemical and molecular biology laboratory techniques; emphasis on nucleic acids and recombinant DNA; vector design and practical incorporation into host systems; product expression, isolation and identification; bioinformatics in research design strategies. Fee Lab Fee: \$50. Six laboratory hours per week. **PREREQUISITE or COREQUISITE:** BIOL 4512 or CHEM 4512, or permission of instructor.

# **BIOL 4511 - BIOCHEMISTRY I**

**Credit Hours:** (3) **Former:** (MMCS 4511) **Description:** Chemistry of amino acids and proteins related to their properties in biochemical systems; protein conformation studies; enzymology, coenzymes and their functions; importance of pH and bioenergetics in catalysis; protein and carbohydrate metabolism. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and CHEM 3511 with at least a C-. *Cross listing:* (Same as CHEM 4511).

# **BIOL 4512 - Biochemistry II**

**Credit Hours:** (3) **Former:** (MMCS 4512) **Description:** Continuation of BIOL 4511; chemistry of lipids; metabolism, membrane formation and function in cell signaling mechanisms and sensory transduction;

1166 chemistry of nucleotides, DNA and RNA; mechanisms of information storage and transmission; advanced treatment of enzyme kinetics. Three lecture hours per week. **PREREQUISITE:** BIOL 4511 or CHEM 4511. *Cross listing:* (Same as CHEM 4512)

# **BIOL 4570 - Practicum In Biology**

**Credit Hours:** (3) **Description:** Directed extra-departmental studies, including internships, in special areas of biology; formal paper and presentation of research results at a departmental seminar required. No more than five total credit hours of research and practicum (BIOL 4000, BIOL 4001, BIOL 4570) can be applied toward major requirements. **PREREQUISITE:** approval from Undergraduate Studies Committee. (S/U)

# BIOL 4600 - Marine Vert Zoo Icht

**Credit Hours:** (6) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Marine Chordata, including lower groups of mammals and birds; emphasis on fishes. **PREREQUISITE:** sixteen semester hours of zoology including comparative anatomy, or permission of instructor.

# **BIOL 4604 - Animal Behavior**

**Credit Hours:** (4) **Description:** Animal behavior, primarily from ecological, physiological, developmental and evolutionary perspective. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

# **BIOL 4610 - Honors Senior Seminar**

**Credit Hours:** (1) **Description:** Student involvement in attending seminars; reading, discussing and presenting specialized topics in biology. No more than 1 credit hour of seminar can be applied toward degree requirement. **PREREQUISITE:** senior standing and permission of instructor and Director of University Honors Program. (S/U)

# **BIOL 4630 - General Endocrinology**

**Credit Hours:** (3) **Description:** Anatomy and physiology of the organs of internal secretion; role of hormones in metabolism and development. Three lecture-demonstration hours per week. **PREREQUISITE:** BIOL 3030 or BIOL 3730, or permission of instructor.

# **BIOL 4635 - Neurobiology**

**Credit Hours:** (3) **Description:** Basic structure and function of nervous system and its development; resting membrane potential, structure/function of ion channels; mechanisms of action potential conduction, presynaptic neurotransmitter vesicle exocytosis, postsynaptic receptors and signal transduction pathways, synaptic structure and development. Three lecture hours per week. **PREREQUISITE:** BIOL 3130 or permission of instructor.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

#### **BIOL 4640 - Ornithology**

**Credit Hours:** (4) **Description:** Biology of birds, with emphasis on avian anatomy, physiology, behavior, and reproductive biology. Field trips emphasize identification of local species and techniques of field study. Fee Course Fee: \$20. Two lecture hours, four field/laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4646 - Marine Fisheries Mgmt**

**Credit Hours:** (4) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Overview of practical marine fishery management problems. **PREREQUISITE:** permission of instructor.

#### BIOL 4651 - Field Tech/Vertebrate Zoology

**Credit Hours:** (4-6) **Description:** Techniques in field study of vertebrates. Extended field studies outside local area. Fee Course Fee: \$20 **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### BIOL 4730 - Urban/Wildlife Eco/Mgmt

**Credit Hours:** (3) **Description:** The study of interrelations and management of organisms considered part of the wildlife realm (game and non-game) in urban environments. Provides an exposure to information required to understand ecological and wildlife issues in urban areas and to develop management strategies for maintaining sustainable natural resources on disturbed landscapes. Three lecture hours per week. **PREREQUISITE:** BIOL 3050 or permission of instructor.

#### **BIOL 4740 - Mammalogy**

**Credit Hours:** (4) **Description:** Classification, distribution, life histories, economic importance, techniques of field study, methods of collection and preservation of mammals. Fee Course Fee: \$20. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4744 - Herpetology**

**Credit Hours:** (4) **Description:** Classification, distribution, life histories, techniques of collection and preservation, and natural habitats of North American reptiles and amphibians. Fee Course Fee: \$35. Two lecture hours, four laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

#### **BIOL 4800 - Marine Invertebrate Zoo**

**Credit Hours:** (6) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Important free living, marine estuarine invertebrates of the Mississippi Sound and adjacent continental shelf of the northeastern 1167 Gulf of Mexico, emphasis on structure, classification, phylogenic relationships, larval development and functional processes. **PREREQUISITE:** 16 hours of zoology including introductory invertebrate zoology.

#### **BIOL 4801 - Marine Invertebrate Zoology Lab**

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Laboratory for BIOL 4800 **PREREQUISITE:** Two semesters of biology or permission of instructor. **COREQUISITE:** BIOL 4800

#### **BIOL 4802 - Elasmobranch Biology**

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. An overview of the biology of sharks, skates, and rays. **PREREQUISITE:** Three semesters of biology, including marine biology or permission of instructor. **COREQUISITE:** BIOL 4803

#### **BIOL 4803 - Elasmobranch Biology Lab**

**Credit Hours:** (2) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Laboratory for BIOL 4802 **PREREQUISITE:** Three semester of biology, including marine biology or permission of instructor. **COREQUISITE:** BIOL 4802

#### **BIOL 4804 - Elasmobranch Physiology**

**Credit Hours:** (5) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Major physiological systems and unique aspects of shark, skate, and stingray physiology including specialized adaptations to the challenges of life in diverse aquatic habitats. **PREREQUISITE:** Three semesters of biology, including marine biology or permission of instructor.

#### **BIOL 4806 - Marine Mammals**

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Emphasis on natural history and population ecology of cetaceans. Includes life history, distribution, population dynamics, diet and feeding, social behavior, evolution, and zoogeography. **PREREQUISITE:** Three semesters of biology. **COREQUISITE:** BIOL 4807

#### **BIOL 4807 - Marine Mammals Lab**

**Credit Hours:** (2) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit given through affiliation with the Laboratory. Laboratory for BIOL 4806 (6806 for grad level). **COREQUISITE:** BIOL 4806

#### **BIOL 4808 - Marine Ichthyology**

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Marine fishes including evolutionary relationships, morphology, physiology and zoogeography. **PREREQUISITE:** Two semesters of biology and permission of instructor. **COREQUISITE:** BIOL 4809

# BIOL 4809 - Marine Ichthyology Lab

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Laboratory for BIOL 4808 **PREREQUISITE:** Two semesters of biology and permission of instructor. **COREQUISITE:** BIOL 4808

# **BIOL 4810 - Field Exercises Coastal Herpetology**

**Credit Hours:** (3) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Topics include the ecology, evolution, life history, diversity, behavior, and conservation of amphibians and reptiles. **PREREQUISITE:** Two semesters of biology or permission of instructor.

# **BIOL 4811 - Cetacean Behavior**

**Credit Hours:** (3) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Review of the literature on the behavior, communication, and cognitive abilities of whales and dolphins, as well as field trips and real time observations of marine mammals. **PREREQUISITE:** Two semesters of biology or permission of instructor.

# **BIOL 4812 - Marine Biology**

**Credit Hours:** (3) **PREREQUISITE:** Eight hours of biological sciences. **COREQUISITE:** BIOL 4813 *Cross listing:* This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. An introduction to marine biology with emphasis on local fauna and flora.

# BIOL 4813 - Marine Biology Lab

1168 Credit Hours: (3) Description: This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. PREREQUISITE: Eight hours of biological sciences. COREQUISITE: BIOL 4812.

#### **BIOL 4814 - Barrier Island Ecology**

**Credit Hours:** (1) **Description:** This course taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Lectures, discussions and field observations on ecology and biodiversity of the Mississippi Sound barrier island ecosystems. **PREREQUISITE:** Three semesters of science or permission of instructor. **COREQUISITE:** BIOL 4815.

#### **BIOL 4815 - Barrier Island Ecology Lab**

**Credit Hours:** (2) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Lectures, discussions and field observations on ecology and biodiversity of the Mississippi Sound barrier island ecosystems. **PREREQUISITE:** Three semesters of science or permission of instructor. **COREQUISITE:** BIOL 4814

#### **BIOL 4844 - Parasites Marine Animals**

**Credit Hours:** (6) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Parasites of marine animals; emphasis on morphology, taxonomy, life histories and host-parasite relationships. Lecture, laboratory and field work included. **PREREQUISITE:** general parasitology, or permission of instructor.

# **BIOL 4850 - Fauna/Ecology Tidal Marsh**

**Credit Hours:** (4) **Description:** This course is taught only at the Gulf Coast Research Laboratory, Ocean Springs, Mississippi. University of Memphis residence credit is given through affiliation with the Laboratory. Survey and discussion of taxonomy, distribution, trophic relationships, reproductive strategies and adaptation of tidal marsh animals; emphasis on those occurring in northern Gulf marshes. **PREREQUISITE:** 16 hours of biology and junior standing, or permission of instructor.

# **BIOL 4900 - Entomology**

**Credit Hours:** (4) **Description:** Morphology, physiology, behavior and ecology of insects. Fee Course Fee: \$20. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121.

# BIOM 1701 - Introduction to Biomedical Engineering Design

**Credit Hours:** (1) **Description:** Engineering design methods and ethics with emphasis on biomedical; group design projects. One lecture hour, two laboratory hours per week. **PREREQUISITE or COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910 or ENGR 1010 with a grade of C- or better.

# BIOM 1702 - Biomedical Engineering Visualization

**Credit Hours:** (1) **Description:** Using engineering drawings and computer-aided drafting packages to communicate information and solve engineering problems; emphasis on group work, project documentation, and oral presentation. One lecture hours, two laboratory hours per week. **PREREQUISITE or COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910 or ENGR 1010 with a grade of C- or better.

# **BIOM 1720 - Intro Biomed Engr Tools**

**Credit Hours:** (3) **Description:** Use of computer tools for data analysis, presentation, documentation; introduction to programming; individual and group design projects. **COREQUISITE:** ENGR 1010.

# **BIOM 2720 - Experimental Design Analysis**

**Credit Hours:** (3) **Description:** Application of probability, statistics, error analysis, uncertainty in design and performance of biomedical engineering experimentation; discussion and evaluation of common experimental designs for medical device development. **PREREQUISITE:** BIOM 1720 and ENGR 1010

#### **BIOM 3010 - Medical Measurements**

**Credit Hours:** (4) **Description:** Theory and application of major types of sensors used in biomedical engineering and clinical medicine; principles of signal processing and instrumentation, such as frequency domain analysis, operational amplifiers, and filtration. Three lecture hours and three laboratory hours per week. **PREREQUISITE:** BIOM 1720, EECE 2201 or EECE 2283 /EECE 2281, PHYS 2120 / PHYS 2121.

# **BIOM 3110 - Med Physiology/BIOM**

**Credit Hours:** (3) **Description:** Basic principles of human physiology and how these are applied in medicine and biomedical engineering problem and devices; physiological principles using appropriate mathematical and engineering models to construct an understanding of how the body works as an integrated system. Students may not use both BIOL 3730 and BIOM 3110 for credit toward degree. **PREREQUISITE:** CHEM 1120, BIOL 1120, PHYS 2120, or permission of instructor.

# BIOM 3710 - Physiological System/Modeling

**Credit Hours:** (3) **Description:** Fundamentals of control theory and mathematical modeling and analysis as applied to physiological

1169 systems. **PREREQUISITE:** CIVL 2131, MATH 2120 or MATH 3402. **PREREQUISITE or COREQUISITE:** BIOL 3730 or BIOM 3110, BIOM 3010

#### **BIOM 4110 - Science of Medicine**

**Credit Hours:** (3) **Description:** Integration of fundamental principles from physics, chemistry, biology and mathematics, and applications of these principles to solve problems in medicine. **PREREQUISITE:** CHEM 1120, BIOL 1120, PHYS 2120, or permission of instructor. *Cross listing:* (Same as BIOL 4110)

#### **BIOM 4150 - Engr Tools Design Med Devices**

**Credit Hours:** (3) **Description:** Major tools that engineers use to assist them in producing good medical device products, and how and where these tools are being used in industry. **PREREQUISITE:** CIVL 2131, BIOL 1120, BIOL 2011 or 2021, MECH 2320, TECH 4472 or equivalent, or permission of instructor.

#### **BIOM 4205 - Intro Biomed and Chem Sensors**

**Credit Hours:** (4) **Description:** Measurement techniques and recognition processes; application of chemical sensors and biosensors to analysis of real samples. Three lecture hours and three laboratory hours per week. **PREREQUISITE:** BIOM 3010, CHEM 1120 and junior standing.

#### **BIOM 4210 - Research Studies**

**Credit Hours:** (1-3) **Description:** Consultation, reading, laboratory and design work to investigate selected areas of biomedical engineering under supervision of faculty member; emphasis on laboratory work, design, and scientific writing. Formal paper required. **PREREQUISITE:** BIOM 2720, MECH 2320 or MECH 2332, BIOM 3010 and permission of instructor.

#### **BIOM 4393 - Appld Finite Element Analysis**

**Credit Hours:** (3) **Description:** Fundamental topics associated with use of finite element analysis in mechanical and biomedical engineering applications; introduction to finite element theory, model generation, CAD interfacing, post-processing of results and validation. **PREREQUISITE:** MATH 2110, MATH 2120 or MATH 3402, CIVL 3322 or MECH 2320 *Cross listing:* (Same as MECH 4393).

#### **BIOM 4410 - Biomedical Engineering Practicum**

**Credit Hours:** (1) **Description:** Preparation for professional practice through experiential learning under the supervision of an experienced engineer with oversight by a member of the department's faculty. Students must work a minimum of 10 hours, and no more than 20 hours per week in a biomedical industry or related institution. Regular reporting throughout course required. Repeatable Maximum repeat for 3 hours credit, but student many not enroll in BIOM 4410 for more than 1 credit hour per semester. **PREREQUISITE:** Departmental

approval. **COREQUISITE:** Cannot be taken concurrently with ENGR 4001. *Cross listing:* MECH 4397

#### **BIOM 4590 - Fundamentals of Engineering Review Biomedical Engineering**

**Credit Hours:** (1) **Description:** A course to prepare students for the Fundamentals of Engineering (FE) exam. Course reviews basic science and engineering topics (e.g. chemistry, calculus and differential equations, circuits, materials, statics, mechanics of materials, thermodynamics, engineering ethics, etc.) that are part of the FE exam. NOTE: Student are encouraged to take the FE exam during the semester in which they are enrolled in this course. One lecture hour per week. **PREREQUISITE:** BIOM 3710, BIOM 4730.

#### **BIOM 4702 - Biotechn Tools for BME Res**

**Credit Hours:** (3) **Description:** Biochemical and biophysical measurement techniques; light spectroscopy, gel exclusion and affinity chromatography, electrophoresis, ELISA, protein and DNA methods. Six hours laboratory. **PREREQUISITE:** BIOL 1120 and BIOL 2011 or BIOL 2021, CHEM 1120/CHEM 1121, BIOM 2720 and BIOM 3010 or permission of instructor.

#### **BIOM 4720 - Bioelectricity**

**Credit Hours:** (4) **Description:** Bioelectricity, including calculations of potential fields resulting from cardiac or neural electrogeneration; treatment of how heart and nerves generate and propagate electrical signals. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** MATH 2120 or MATH 3402, BIOL 1120, CHEM 1120, BIOM 3010, or permission of instructor.

#### **BIOM 4730 - Biomaterials**

**Credit Hours:** (4) **Description:** Synthetic materials and their interaction with the physiological environment; methods to design and study materials that are compatible with natural tissue. **PREREQUISITE:** BIOL 1120, CIVL 2131 or permission of instructor. *Cross listing:* (Same as MECH 4365).

#### **BIOM 4750 - Biomechanics**

**Credit Hours:** (4) **Former:** (3750) **Description:** Application of mechanical principles to the human body, with focus on joint function, muscle force transmission and generation, gait, soft-tissue mechanics, injury mechanisms and risk, and experimental measurements. **PREREQUISITE:** CIVL 3322 or MECH 2320, MATH 2110, MATH 2120 or MATH 3402, or permission of instructor.

#### **BIOM 4760 - Biomed Engr Design Principles**

**Credit Hours:** (3) **Description:** Practical design methods emphasizing the front-end or concept development stage of engineering design; design a system, component, or process to meet desired needs within realistic constraints with functioning on multi-disciplinary teams.

1170 **PREREQUISITE:** BIOM 3110 or BIOL 3730, BIOM 2720, BIOM 3710, and either MECH 2332 or MECH 2320.

#### **BIOM 4782 - Biomedical Design Practicum**

**Credit Hours:** (1) **Description:** Practical application of biomedical design principles with emphasis on project management, teamwork, prototype production, risk analysis and management, technical drawings, patent review with claim development, market analysis, regulatory issues, professional and ethical responsibilities of a biomedical engineer, engineering analysis/reports, incorporation of standards, prototype verification/validation, and presentation skills. **PREREQUISITE:** BIOM 4760 **COREQUISITE:** BIOM 4784

#### **BIOM 4784 - Biomedical Design Studio**

**Credit Hours:** (2) **Description:** Laboratory experience dedicated to the design, development, and fabrication of a final prototype for use in conducting engineering analysis and design loop feedback. Responsibilities will include frequent team meetings, mentor advising, and group brainstorming along with prototype designing, technical drawings, fabrication, engineering analysis, and verification/validation. Deliverables for each team will be a prototype, final design specification report with engineering reports, and a final team presentation. **PREREQUISITE:** Prerequisite: BIOM 4760. **COREQUISITE:** Co-requisite: BIOM 4782

#### **BIOM 4800 - BME Honors Seminar**

**Credit Hours:** (1) **Description:** Weekly presentations of biomedical engineering research by visiting faculty and invited speakers; discussion of current biomedical research and topics in journals or other scientific media and professional/ethical duties and responsibilities. Course does not satisfy degree requirements, but is required to graduate with honors in Biomedical Engineering. **PREREQUISITE:** junior standing and approval of the Honors Committee in Biomedical Engineering.

#### BIOM 4900-4919 - Special Topics in Biomedical Engineering

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

#### **BIOM 4999 - BME Honors Thesis**

**Credit Hours:** (3) **Description:** Under the direction of a faculty member, the student writes and defends a thesis based upon background reading and experimental research on a topic in biomedical engineering. NOTE: only BIOM 4999 or BIOM 4210 can be applied toward degree, not both. **PREREQUISITE:** senior standing and approval of the Honors Committee of the Department of Biomedical Engineering.

#### **BA 4811 - Internship in Business**

**Credit Hours:** (1-6) **Description:** Internship designed to provide credit for business students who have earned the maximum number of internship credit hours allowed in their major, or business students who are enrolled in an internship not in their major. This course will be counted as a general elective, not as a required or elective course in the student's major. **PREREQUISITE:** 2.75 overall GPA or a minimum 3.0 GPA based on pper division business course completed; completed a minimum of two major courses; and completed 15 hours of upper-division business courses.

#### **BA 4900 - Practicum In Research**

**Credit Hours:** (1-3) **Description:** Actual problem-solving research activities in business and economics. Student assigned to project either being conducted currently by faculty member or one developed under supervision of faculty member. Whenever possible, project within student's major field of study. **PREREQUISITE:** senior status.

# BA 4910 - Independent Study in International Business

**Credit Hours:** (1-3) **Description:** Student conducts an approved research project in the International Business area under the supervision of a faculty member. Variable credit hours 1 to 3. **PREREQUISITE:** Senior standing and permission of department chair.

#### **BA 4911 - Internship International Business**

**Credit Hours:** (1-6) **Description:** Practical operations of international business. Students placed for 1-8 month period with cooperating business firm operating in fields of international banking and finance, transportation, management, marketing or accounting. Academic credit granted upon certification of satisfactory performance by cooperating business firm and upon acceptance by faculty of written research report by student. **PREREQUISITE:** 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of upper division business courses.

# CHEM 1010 - Chemistry of Materials\*\*

**Credit Hours:** (3) **Description:** Measurement and the scientific method; states of matter; fundamental laws of chemistry; modern atomic theory; water and aqueous solutions; oxidation-reduction and acid-based reactions; nuclear chemistry; energy and materials in modern society; environmental impact and sustainability. Three lecture hours per week. NOTE: not credited toward major in any of the physical sciences, biological sciences, mathematics, or engineering. **PREREQUISITE:** MATH 1420 or MATH 1710 or an ACT MATH subscore appropriate for placement in MATH 1710 **[G]** 

# CHEM 1011 - Chemistry of Materials Lab \*\*

**Credit Hours:** (1) **Description:** Experiments and experimental techniques in general and inorganic chemistry. Fee Lab Fee: \$30. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** CHEM 1010. **[G]** 

#### CHEM 1020 - Chemistry of Life

**Credit Hours:** (3) **Description:** Basics of organic and biological chemistry: properties, reactions and nomenclature of enzymes, organic functional groups; amino acids, lipids, carbohydrates, nucleic acids and biochemical pathways. Three lecture hours per week. NOTE: not credited toward major in any of the physical sciences, biological sciences, mathematics, or engineering. **PREREQUISITE:** high school chemistry or CHEM 1010, and MATH 1420 or MATH 1710 with a minimum grade of C-, or an ACT MATH subscore appropriate for placement in MATH 1710. **[G]** 

#### CHEM 1021 - Chemistry of Life Lab

**Credit Hours:** (1) **Description:** Experiments and experimental techniques in organic and biochemistry. Fee Lab Fee: \$30. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** CHEM 1020. **[G]** 

# **CHEM 1100 - Prep General Chemistry**

**Credit Hours:** (3) **Description:** For students whose curriculum requires CHEM 1110 but who have inadequate background; emphasis on scientific calculations and properties of matter. Three lecture hours per week. NOTE: does not satisfy any part of science requirement for any degree. **PREREQUISITE or COREQUISITE:** MATH 1710 or MATH 1730 with a minimum grade of C- (or equivalent) or an ACT MATH subscore appropriate for placement into MATH 1830 or higher.

# **CHEM 1110 - General Chemistry I**

**Credit Hours:** (3) **Description:** Laws of chemistry; periodic table and chemical periodicity. stoichiometry, nomenclature. modern atomic theory and bonding; ionic and molecular compounds; molecular geometry; oxidation-reduction reactions; solutions and heterogeneous mixtures; gaseous state; states of matter and intermolecular forces; thermochemistry. Three lecture hours per week. **PREREQUISITE:** high school chemistry or CHEM 1100 or CHEM 1010, and MATH 1710 or MATH 1730 (or equivalent) with at least C-, or an ACT MATH subscore earning placement into MATH 1720 or higher. **COREQUISITE:** CHEM 1111 recommended. **[G]** 

# CHEM 1111 - General Chemistry I Lab

Credit Hours: (1) Description: Experiments and experimental techniques in general chemistry. Fee Lab Fee: \$30. Three laboratory hours per week. **PREREQUISITE or COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 1110. [G]

# **CHEM 1120 - General Chemistry II**

**Credit Hours:** (3) **Description:** Continuation of CHEM 1110. Physical properties of solutions; acid-based reactions; chemical kinetics and reaction mechanisms; chemical equilibrium; thermodynamics; electrochemistry; chemistry of elements. Three lecture hours per week. **PREREQUISITE:** CHEM 1110 with at least C-. **COREQUISITE:** CHEM 1121 recommended. **[G]** 

# CHEM 1121 - General Chemistry II Lab

**Credit Hours:** (1) **Description:** Continuation of CHEM 1111. Fee Lab Fee: \$30. Three laboratory hours per week. **PREREQUISITE:** CHEM 1111 with at least C-. **PREREQUISITE or COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 1120.

# **CHEM 3111 - Foundations/Inorganic CHEM**

**Credit Hours:** (3) **Description:** Fundamental concepts of inorganic chemistry; periodic trends; acid/base and redox reactions and electrochemistry; the chemistry of solid-state materials and minerals; coordination chemistry; bonding theories; an introduction to crystal field theory; chemical nomenclature; inorganic energetics, kinetics, and thermodynamics; Group Theory. Three lecture hours per week. **PREREQUISITE:** CHEM 1120 with at least C-.

# CHEM 3201 - Foundation/Analytical CHEM lab

**Credit Hours:** (2) **Description:** Application of the techniques of quantitative analysis in areas described in CHEM 3211. Fee Lab Fee: \$30. Six laboratory hours per week. **PREREQUISITE or COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 3211.

#### **CHEM 3211 - Foundations/Analytical CHEM**

**Credit Hours:** (3) **Description:** Theory and practice of modern chemical analysis; acid base, redox, and complex ion equilibria, separation methods, absorptiometry, flame spectroscopy, and electroanalytical methods. Two lecture hours per week. **PREREQUISITE:** CHEM 1120 and CHEM 1121 with at least C-. **COREQUISITE:** CHEM 3201 recommended.

#### **CHEM 3301 - Foundations/Organic Chem Lab**

**Credit Hours:** (1) **Description:** Emphasis on laboratory techniques as applied to synthesis and other reactions. Fee Lab Fee: \$30. Three laboratory hours per week. **PREREQUISITE:** CHEM 1120 and CHEM 1121 with at least C-. **PREREQUISITE or COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 3310.

#### CHEM 3310 - Foundations/Organic Chemistry

**Credit Hours:** (3) **Description:** Systematic study of structures, physical properties, reactivity of organic compounds; interpretations based on modern theories of organic chemistry; emphasis on alcohols, amines, carboxylic acids and their derivatives. Three lecture hours per week. **PREREQUISITE:** CHEM 1120 with at least C-.

#### **CHEM 3411 - Foundations/Physical Chemistry**

**Credit Hours:** (3) **Description:** Fundamentals of thermodynamics and kinetics and their applications in chemical and biological systems; selected topics in the areas of surface chemistry, spectroscopy and macromolecules. Three lecture hours per week. **PREREQUISITE:** MATH 1830 or MATH 1910, PHYS 2020/PHYS 2021 or PHYS 2120/PHYS 2121 with at least C-.

1172

#### **CHEM 3501 - Foundation/Bioorganic Chem Lab**

**Credit Hours:** (1) **Description:** Computational and experimental studies of concentrations, structures and functions of biomolecules, including amino acids, proteins, carbohydrates, lipids, and nucleic acids. Three laboratory hours per week **PREREQUISITE:** CHEM 3301 with at least C-. **PREREQUISITE or COREQUISITE:** CHEM 3511 with at least a C-.

#### **CHEM 3511 - Foundations/Bioorganic CHEM**

**Credit Hours:** (3) **Description:** Systematic study of structure of biomolecules, including amino acids, proteins, carbohydrates, lipids and nucleic acids; emphasis on functional consequences. Three lecture hours per week. **PREREQUISITE:** CHEM 3310 with at least C-.

#### **CHEM 4001 - Environmental Chemistry**

**Credit Hours:** (3) **Description:** Chemical phenomena occurring in soil, atmospheric and aquatic environments; consideration of natural resources and energy. Three lecture hours per week. **PREREQUISITE:** CHEM 3310 and CHEM 3211 with at least C-.

#### **CHEM 4101 - Inorganic Chemistry Lab**

**Credit Hours:** (1) **Description:** Experimental techniques of inorganic synthesis and physical methods for characterization of inorganic and organometallic compounds. Three laboratory hours per week. **PREREQUISITE or COREQUISITE:** CHEM 4111 with at least a "C-" *Cross listing:* CHEM 6101

#### **CHEM 4111 - Intermediate Inorganic CHEM**

**Credit Hours:** (3) **Description:** Theoretical and applied inorganic chemistry; relationship of structure and bonding to properties of elements and compounds; molecular orbital theory, coordination compounds and organometallics, ligand field theory, nonaqueous solvent systems, and reaction mechanisms. Three lecture hours per week. **PREREQUISITE:** CHEM 3111 with at least C-, or permission of the instructor.

# CHEM 4180-4199 - Special Topics In Inorganic Chemistry

**Credit Hours:** (1-3) **Description:** Topics in inorganic chemistry that are of current interest. Topics are varied and in online class listings. **PREREQUISITE:** CHEM 3111 with at least C- and permission of instructor.

# **CHEM 4201 - Instrumental Analysis Lab**

**Credit Hours:** (1) **Description:** Application of techniques of instrumental analysis in areas of atomic and molecular spectroscopy, mass spectrometry, electroanalytical chemistry and chromatography. Three laboratory hours per week. **PREREQUISITE:** CHEM 3211 with minimum grade of C-. **PREREQUISITE or COREQUISITE:** PREREQUISITE with minimum grade of C- or COREQUISITE: CHEM 4211.

# **CHEM 4211 - Instrumental Analysis**

**Credit Hours:** (3) **Description:** Topics in modern analytical instrumental analysis; atomic and molecular spectroscopy, mass spectrometry, electroanalytical chemistry and chromatograhpy. Three lectures hours per week. **PREREQUISITE:** CHEM 3211 with at least C-.

# CHEM 4280-4299 - Special Topics In Analytical Chemistry

**Credit Hours:** (1-3) **Description:** Topics of current interest in analytical chemistry. Topics are varied and in online class listings. **PREREQUISITE:** CHEM 3211 with at least C- and permission of instructor.

# **CHEM 4310 - Intermediate Organic Chemistry**

**Credit Hours:** (3) **Description:** Expansion of select topics from CHEM 3310 including in-depth analysis of structure and reactivity in organic compounds, synthetically important transformations, introduction to synthetic methods for preparing small molecules, and methods of identification. Lecture focused on problem solving. Three lecture hours per week. **PREREQUISITE:** CHEM 3310 or permission of instructor.

# **CHEM 4311 - Physical Organic Chemistry**

**Credit Hours:** (3) **Description:** Theory of electronic structure organic compounds, relation between structure and reactivity of organic compounds, mechanisms of common organic reactions. Three lecture hours per week. Repeatable Repeat no more than two times. **PREREQUISITE:** CHEM 3310 and CHEM 3511 with at least a C-.

# **CHEM 4315 - Organic Medicinal Chem**

**Credit Hours:** (3) **Description:** Introduction to principles of medicinal chemistry; structure, synthesis, and biochemical mechanism of action of major drug classes. Three lecture hours per week. **PREREQUISITE:** CHEM 3511 with at least C-.

# CHEM 4380-4399 - Special Topics In Organic Chemistry

**Credit Hours:** (1-3) **Description:** Topics of current interest in organic chemistry. Topics are varied and in online class listings.

1173 **PREREQUISITE:** CHEM 3310 with at least C- and permission of instructor.

#### CHEM 4406 - Molecular Spectroscopy Lab

**Credit Hours:** (1) **Description:** Determination of molecular structure of compounds using nuclear magnetic resonance spectroscopy, infrared spectroscopy, and mass spectrometry. Three laboratory hours per week. **PREREQUISITE:** CHEM 3301 with at least C-. **PREREQUISITE:** or **COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 4416.

#### **CHEM 4411 - Advanced Physical Chem**

**Credit Hours:** (3) **Description:** Advanced topics in physical chemistry; statistical mechanics and statistical thermodynamics plus selected topics in the areas of kinetic theory of gases, condensed phases, and non-equilibrium processes. **PREREQUISITE:** CHEM 3411 with at least C-, or permission of instructor.

# CHEM 4414 - Quantum Chemistry/Spectroscopy

**Credit Hours:** (3) **Description:** A study of theoretical chemistry, chemical physics, theoretical molecular spectroscopy, and solid-state chemistry with emphasis on fundamentals of quantum mechanics, vibrational and rotational spectroscopy, molecular electronic spectra, and computational chemistry. Three lecture hours per week. **PREREQUISITE:** CHEM 3411 or permission of instructor.

# CHEM 4416 - Molecular Spectroscopy

**Credit Hours:** (3) **Description:** Theory, instrumentation and applications of NMR, FT-IR, mass spectrometry, and UV-visible spectroscopy. Application and theory of other spectroscopic methods will be discussed briefly. Three lecture hours per week. **PREREQUISITE:** CHEM 3310 and CHEM 3411 with at least C-.

# CHEM 4480-4499 - Special Topics in Physical Chemistry

**Credit Hours:** (1-3) **Description:** Topics of current interest in physical chemistry. Topics are varied and in online class listings. **PREREQUISITE:** CHEM 3411 with at least C- and permission of instructor.

# CHEM 4501 - Lab Tech In Biochem

**Credit Hours:** (2) **Description:** Biochemical techniques, analysis and design strategies; properties of proteins/enzymes, including binding, catalysis, kinetics, electron and proton transport processes of intermediate metabolism; purification, characterization and assay of enzymes using chromatography, spectroscopy, electrophoresis. Fee Lab Fee: \$50. Six laboratory hours per week. **PREREQUISITE:** CHEM 3501 with at least C-. **PREREQUISITE or COREQUISITE:** BIOL 4511 (or 6511) OR CHEM 4511 (or 6511). *Cross listing:* (Same as BIOL 4503)

# CHEM 4511 - Biochemistry I

**Credit Hours:** (3) **Description:** Chemistry of amino acids and proteins related to their properties in biochemical systems; protein conformation studies; enzymology, coenzymes and their functions; importance of pH; bioenergetics in catalysis; protein and carbohydrate metabolism. Three lecture hours per week. **PREREQUISITE:** BIOL 1120 and CHEM 3511 with at least C-. *Cross listing:* (Same as BIOL 4511).

#### CHEM 4512 - Biochemistry II

**Credit Hours:** (3) **Description:** Continuation of CHEM 4511; chemistry of lipids; metabolism, membrane formation and function in cell signaling mechanisms and sensory transduction; chemistry of nucleotides DNA and RNA; mechanisms of information storage and transmission; advanced treatment of enzyme kinetics. Three lecture hours per week. **PREREQUISITE:** BIOL 4511 or CHEM 4511 with at least C-. *Cross listing:* (Same as BIOL 4512)

# CHEM 4580-4599 - Special Topics in Biochemistry

**Credit Hours:** (1-3) **Description:** Topics of current interest in biochemistry. Topics are varied and in online class listings. **PREREQUISITE:** CHEM 4512 with at least C- and permission of instructor.

#### CHEM 4603 - Materials Synthesis Lab

**Credit Hours:** (1) **Description:** Practical application of modern chemical synthesis; experimental studies in synthetic organic, organometallic, inorganic, polymer, and nanomaterial chemistry. Three laboratory hours per week. **PREREQUISITE:** CHEM 3301 with at least C-. **PREREQUISITE or COREQUISITE:** PREREQUISITE with at least C- or COREQUISITE: CHEM 4613

#### **CHEM 4613 - Materials Synthesis**

**Credit Hours:** (3) **Description:** Principles, methods and applications of modern chemical synthesis; organic, organometallic, inorganic, polymer, and nanomaterial synthetic reactions and techniques; multistep and interdisciplinary synthesis. Three lecture hours per week. **PREREQUISITE:** CHEM 3111 and CHEM 3310 with at least C-.

# **CHEM 4614 - Polymer Chemistry**

**Credit Hours:** (3) **Description:** Fundamental concepts in polymer chemistry and polymer physics with focus on synthesis, characterization, structure and properties of polymeric materials. Three lecture hours per week. **PREREQUISITE:** CHEM 3310 and CHEM 3411 with at least C-.

# CHEM 4615 - Biophysical Chemistry

**Credit Hours:** (3) **Description:** Study of biomolecular structures and properties; emphasis on biophysical techniques applicable to study of

1174 biomolecular structures and properties. Three lecture hours per week. **PREREQUISITE:** CHEM 3411 and CHEM 3511 with at least C-.

#### **CHEM 4901 - Chemical Research I**

**Credit Hours:** (1) **Description:** Introduction to basic research; collaboration with faculty sponsor on problem of mutual interest in any chemical subdiscipline; effective literature search, laboratory techniques, experimental design, preparation and revision of formal scientific paper. Fee Course Fee: \$30 One seminar hour per week. **PREREQUISITE:** CHEM 3111 or CHEM 3211 or CHEM 3310 with at least C-, permission of instructor and complete prospectus in consultation with faculty sponsor.

#### **CHEM 4902 - Chemical Research II**

**Credit Hours:** (1) **Description:** Continuation of basic research; student collaborates with faculty sponsor on problem of mutual interest in any chemical subdiscipline; experience gained in effective literature search, laboratory techniques, experimental design, preparation and revision of formal scientific paper. Fee Course Fee: \$30. One seminar hour per week. **PREREQUISITE or COREQUISITE:** CHEM 4901.

#### **CHEM 4903 - Chemical Research III**

**Credit Hours:** (1) **Description:** Completion of research project; student collaborates with faculty sponsor on problem of mutual interest in any chemical subdiscipline; experience gained in effective literature search, laboratory techniques, experimental design, preparation and revision of formal scientific paper. Fee Course Fee: \$30. One seminar hour per week. **PREREQUISITE or COREQUISITE:** CHEM 4902.

#### **CHEM 4916 - Teaching Chemistry**

**Credit Hours:** (1-3) **Description:** This course allows students with substantive experience teaching chemistry in a laboratory or classroom setting to receive chemistry credit toward a BS degree. A minimum of 50 contact hours must be documented per credit hour. **PREREQUISITE:** permission of instructor (S/U)

#### **CHEM 4918 - Chemistry Practicum**

**Credit Hours:** (1-3) **Description:** Hands-on experience of chemistry in commercial, medical, or laboratory workplace setting. A minimum of 50 hours employment or internship must be documented per credit hour. **PREREQUISITE:** permission of instructor. (S/U)

#### CHEM 4999 - Senior Survey

**Credit Hours:** (1) **Description:** Capstone course for chemistry majors; review of key concepts in analytical, organic, inorganic, and physical chemistry; discussion of professional skills and career development. One lecture hour per week. **PREREQUISITE or COREQUISITE:** CHEM 3111, CHEM 3411.

# CDFS 2100 - Intro Fld of Chid Dev & Fam St

**Credit Hours:** (3) **Description:** This course is designed for students to explore the field of child development. Students will visit child care centers, child advocacy agencies and organization whose focus is child life/child intervention. Field experience required. **PREREQUISITE or COREQUISITE:** EDPR 2111

# CDFS 2101 - Family/Global Perspective \*\*

**Credit Hours:** (3) **Former:** (Was CSED) **Description:** Introduction to family as a primary, global, social institution; contributions sociology, anthropology, have made to understanding how and why family systems vary worldwide and common bonds and problems facing families in modern societies. **[G]** 

#### CDFS 2200-2209 - Special Topics in Child Development and Family Studies

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing

# **CDFS 3401 - Parent Child Relations**

**Credit Hours:** (3) **Former:** (Was CSED) **Description:** Parental role, parent-child relationship, and factors that influence parenthood.

# CDFS 3410 - Soc Emotion Lrng Early Child

**Credit Hours:** (3) **Description:** Social and emotional development of young children; attachment, cooperation, empathy, grit, perseverance, and problem solving; how teachers in early childhood can foster the development of these skills to build the foundation for success in school and life; theory, research, and practice concerning the development, behavior, and learning of young children. Field experience required.

# CDFS 3420 - Play-Based Assessment for Young Children (0-4)

**Credit Hours:** (3) **Description:** This course offers an examination of the broad range of assessment issues for Infants, toddlers, and preschoolers. It approaches assessment as an integral part of the leaching and learning process. **PREREQUISITE:** CDFS 2100, CDFS 3401, CDFS 3410

# CDFS 4101 - Int Curr for Early Learners

**Credit Hours:** (3) **Former:** (Was CSED) **Description:** Examination of the components of high quality, evidence-based practices to support children's development in early care and Pre-K settings. NOTE: This course is not applicable for teacher licensure.

# CDFS 4220 - Understand Chldn/Behv/Guide

**Credit Hours:** (3) **Former:** (Was CSED) **Description:** Examination of environments in which children develop; family, school, and culture; environmental issues related to behavior, guidance and discipline,

families in transition, environmental stressors, child care, parent involvement in schools, the media, special needs children, child advocacy/public policy. Discussions will focus on theory, research, and practice concerning the development, behavior, and learning of Pre-K children.

#### CDFS 4223 - Home/School/Comm Engage

**Credit Hours:** (3) **Description:** Theoretical approach to understanding, appreciating and supporting diverse families; strategies for collaborating with all families while utilizing community resources to strengthen the home, school and community. Field experience required. **PREREQUISITE:** Adding CDFS 2101 and CDFS 3401

#### CDFS 4230 - Math/Science Early Learning

**Credit Hours:** (3) **Description:** Developmental theory and research as related to the curriculum areas; foundation for selection and design of curriculum materials and activities appropriate for infant through age four; fundamental concepts and skills for teaching math and science to young children are practiced.

# CDFS 4240 - Hospitalized Children and Their Families

**Credit Hours:** (3) **Description:** Theories and research about children and their families in the healthcare environment; introduction to the child life profession. **PREREQUISITE:** Adding ENGL 1010 and 1020. Junior Status.

# CDFS 4260 - Child Life: Theory and Practice

**Credit Hours:** (3) **Description:** Application of the fundamental skills in helping children and their families cope with the stress of the healthcare environment. **PREREQUISITE:** CDFS 4240

# **CDFS 4300 - Play/Therapeutic Interventions**

**Credit Hours:** (4) **Description:** Theories, research, and practical application surrounding play and therapeutic interventions with children, especially stressful environments. **PREREQUISITE:** CDFS 4240, CDFS 4260

# CDFS 4910 - Ethics in Early Care and Learning

**Credit Hours:** (3) **Description:** Overview of historical views on leadership and issues and challenges of leadership in early care and learning. Emphasis on current trends and issues. This course also reviews ethical principles as they relate to children, families, colleagues, and the community and society. **PREREQUISITE:** CDFS 3401 **COREQUISITE:** CDFS 4220

# CDFS 4920-4929 - Special Topics in Child Development and Family Studies

**Credit Hours:** (1-3) **Description:** Lectures and conferences covering selected areas of current interest. See online class listings for topics. Repeatable May be repeated; credit applicable to degree is limited.

# CDFS 4940-4949 - Workshop in Child Development and Family Studies

**Credit Hours:** (1-3) **Description:** Group study related to specific phases of family and consumer education. Repeatable May be repeated.

# CHIN 1010 - Elementary Chinese I

**Credit Hours:** (3) **Description:** Principles of pronunciation; everyday expressions; basic sentence patterns through oral practice, writing and reading.

# CHIN 1020 - Elementary Chinese II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** CHIN 1010 or equivalent.

# CHIN 2010 - Intermediate Chinese I

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** CHIN 1020 or equivalent.

#### CHIN 2020 - Intermediate Chinese II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** CHIN 2010 or equivalent.

# **CHIN 3301 - Conversation and Composition I**

**Credit Hours:** (3) **Description:** Development of speaking and writing skills on various topics, including the study of selected grammatical structures and creative expressions. **PREREQUISITE:** CHIN 2020 or equivalent.

# CHIN 3302 - Conversation & Composition II

**Credit Hours:** (3) **Description:** Continuation of CHIN 3301. Further development of speaking and writing skills on expanded topics, including working with higher-level texts. **PREREQUISITE:** CHIN 3301 or equivalent.

# CHIN 3402 - Readings in Chinese Culture

**Credit Hours:** (3) **Description:** Thematic readings of material written in Chinese related to various topics in Chinese culture.

CHIN 4301 - Modern Chinese Fiction

**Credit Hours:** (3) **Description:** Reading in twentieth century Chinese fiction; themes of modernity, nationalism, class, gender and self. **PREREQUISITE:** CHIN 3301, CHIN 3302 or permission of instructor.

#### CHIN 4304 - Advanced Chinese I

**Credit Hours:** (3) **Description:** Advanced development of language skills (speaking, listening, reading, and writing) and cultural knowledge. **PREREQUISITE:** CHIN 3302 or equivalent.

#### CHIN 4305 - Advanced Chinese II

**Credit Hours:** (3) **Description:** Continuation of CHIN 4304. Further development of advanced language and cultural skills. **PREREQUISITE:** CHIN 4304 or equivalent.

#### CHIN 4401 - Business Chinese I

**Credit Hours:** (3) **Description:** Enhancement of Chinese language skills for use in a business setting. Training in the formal style charateristic of Chinese business language. Contextual knowlege of the social and cultural aspects of conducting business in China. **PREREQUISITE:** CHIN 3301. **COREQUISITE:** CHIN 3301

#### CHIN 4402 - Business Chinese II

**Credit Hours:** (3) **Description:** Continuation of CHIN 4401. Further enhancement of Chinese language skills for use in expanded business settings. **PREREQUISITE:** CHIN 4401.

#### **CHIN 4501 - Intro to Chinese Linguistics**

**Credit Hours:** (3) **Description:** Provides students with a general overview of the basic issues in Chinese linguistics including phonetics, phonology, morphology and syntax. Teaching strategies related to these issues will also be briefly discussed. **PREREQUISITE:** CHIN 3301 or permission of instructor.

#### CHIN 4780 - Individual Studies

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of Chinese chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of the instructor.

# CHIN 4791-4799 - Special Topics in Chinese Literature, Language, or Civilization.

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# PLAN 3451 - Introduction to Planning

**Credit Hours:** (3) **Former:** (PLAN) **Description:** Introduction to regional and urban planning emphasizing spatial relationships of physical, economic, and cultural phenomena necessary in planning process.

#### PLAN 4002 - Urban Food Security

**Credit Hours:** (3) **Description:** Origins, evolution, and current state of urban food distribution and accessibility; current challenges encountered by poor and working class individuals and families in accessing food in economically distressed areas; examination of alternative policies, plans, and programs designed to promote more equitable access to healthy foods in inner city communities. Course will include community-based field work.

# PLAN 4003 - Community Economic Development

**Credit Hours:** (3) **Description:** Origins, evolution, and current state of community-based economic development. Course will include community-based field work.

# PLAN 4004 - Community Organizing

**Credit Hours:** (3) **Description:** Origins, evolution, and current state of direct action organizing in the United States; principles, methods, and techniques of grassroots organizing. Course will include community-based field work.

#### PLAN 4201 - Urbanization and Environment

**Credit Hours:** (3) **Former:** (PLAN) **Description:** Ways man has changed natural environment by urbanization and how physical features and processes influence development and function of cities.

#### PLAN 4261 - Plan Sustainable CitiesRegions

**Credit Hours:** (3) **Description:** Multidisciplinary and multi-scaled approach to understanding the sustainability of natural and built environments in planning cities and regions; methods for measuring sustainability; emerging development concepts and practices; technology, efficiency, social equity and public health implications of sustainability; sustainable urban/regional form of the future.

#### PLAN 4443 - Transportation Planning

**Credit Hours:** (3) **Description:** Planning for various transportation modes and networks and impact they have on land use and contemporary development problems. *Cross listing:* ESCI 4443

# PLAN 4551 - Urban Planning Studio

**Credit Hours:** (3) **Former:** (PLAN) **Description:** Application of planning process to urban problems and preparation of plans for the urban area. **PREREQUISITE:** GEOG 3451 or permission of instructor.

**Credit Hours:** (3) **Description:** Topics vary and are announced in the online class listing.

#### **CIVL 1101 - Civil Engr Measurements**

**Credit Hours:** (3) **Description:** Theory of measurements, linear measurements, angles, topographic surveys, and mapping with applications in Civil Engineering; emphasis on individual and group problem solving, techniques of data collection and analysis, and project documentation. Two lecture hours, three laboratory hours per week. **PREREQUISITE or COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910 with a grade of C- or better.

#### **CIVL 1112 - Civil Engr Analysis**

**Credit Hours:** (3) **Description:** Microcomputer applications for data analysis, presentation, documentation; emphasis on algorithm design and logic; fundamental numerical analysis; elementary programming. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** CIVL 1101.

#### **CIVL 2101 - Civil Engr Visualization**

**Credit Hours:** (3) **Description:** Using engineering drawings and computer-aided drafting packages to communicate information and solve engineering problems; emphasis on group work, project documentation, and oral presentation. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** CIVL 1112.

# **CIVL 2107 - Civil Engr Computation**

**Credit Hours:** (3) **Description:** Incorporating programming logic into spreadsheet solutions to engineering problems; emphasis on group work, project documentation, oral presentation. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** CIVL 2101.

#### CIVL 2131 - Statics

**Credit Hours:** (3) **Description:** Analysis of two and three dimensional force systems; centroids and moments of inertia; friction. Three lecture hours per week. **PREREQUISITE:** PHYS 2110/PHYS 2111. **PREREQUISITE or COREQUISITE:** MATH 1920 or MATH 2421.

#### CIVL 3103 - Approx/Uncertainty in Engr

**Credit Hours:** (3) **Description:** Application of fundamental numerical methods to obtain approximate solutions to engineering problems; application of fundamental probabilistic methods to quantify uncertainty in engineering data. Three lecture hours per week. **PREREQUISITE:** CIVL 2107.

# **CIVL 3121 - Structural Analysis I**

**Credit Hours:** (3) **Description:** Analysis of statically determinate structures; reactions, shear, and moment; truss analysis; deflections; influence lines and moving loads. Three lecture hours per week. **PREREQUISITE:** CIVL 2107, CIVL 2131. **PREREQUISITE or COREQUISITE:** CIVL 3322.

# **CIVL 3131 - Design of Steel Structures**

**Credit Hours:** (3) **Description:** Current design concepts for structural steel members and their connections. Three lecture hours per week. **PREREQUISITE:** CIVL 3121, CIVL 3322.

# **CIVL 3137 - Civil Engr Materials**

**Credit Hours:** (3) **Description:** Properties of aggregates, mix design and use of Portland cement concrete, masonry products and construction, use of wood and timber products in construction, bituminous materials and mixtures and other engineering materials. Three lecture hours. **PREREQUISITE or COREQUISITE:** CIVL 3322.

# **CIVL 3140 - Environmental Systems Engineering**

**Credit Hours:** (4) **Description:** Fundamentals of environmental engineering systems with emphasis on the integration of the concepts of chemistry, hydraulics, economics, English, and social sciences as they can be applied to benefit mankind. Three lecture hours, three laboratory hours per week. **PREREQUISITE or COREQUISITE:** CIVL 3180.

# **CIVL 3161 - Transportation Systems Engineering**

Credit Hours: (3) Description: Development and function of transportation systems; operational control and characteristics; system coordination, traffic flow and patterns. Three lecture hours per week. PREREQUISITE: PHYS 2110, MATH 1920 or MATH 2421. PREREQUISITE or COREQUISITE: CIVL 3103

# **CIVL 3180 - Civil Engr Hydraulics**

**Credit Hours:** (3) **Description:** Basic principles of incompressible fluid mechanics with emphasis on hydrostatics, conservation of energy and momentum with application on engineering analysis of pipe networks, pumps, and open channel systems. Three lecture hours per week. **PREREQUISITE:** CIVL 2107, CIVL 2131.

# CIVL 3181 - Hydraulics and Hydrology

**Credit Hours:** (3) **Description:** Hydraulics of pipe systems and networks, frequency analysis of period of record discharge, design of drainage systems, open channels, and quantification of precipitation and runoff. Three lecture hours per week. **PREREQUISITE:** CIVL 3180.

# CIVL 3182 - Hydraulics and Hydrology Lab

1178 **Credit Hours:** (1) **Description:** Principles of fluid mechanics, open channel hydraulics, and collection of hydrologic data; fluid instrumentation, measurement techniques, data collection methods, and organization of written reports of experimental investigations. Two laboratory hours per week. **PREREQUISITE:** CIVL 3180.

# **CIVL 3322 - Mechanics of Materials**

**Credit Hours:** (3) **Description:** Analysis of components subjected to tension, compression, bending moment, torque; combined loading; Mohr's stress circle; deflection of beams; simple treatment of column buckling. Three lecture hours per week. **PREREQUISITE:** CIVL 2131.

#### **CIVL 3325 - Mechanics of Materials Lab**

**Credit Hours:** (1) **Description:** Materials testing and evaluation. Three laboratory hours per week. **PREREQUISITE or COREQUISITE:** CIVL 3322.

# **CIVL 4111 - Engineering Economics**

**Credit Hours:** (3) **Description:** Application of economics and decision theory to engineering alternatives in planning, developing, constructing, and managing engineering projects. Three lecture hours per week. **PREREQUISITE:** Junior standing in Engineering or permission of instructor.

# CIVL 4122 - Structural Analysis II

**Credit Hours:** (3) **Description:** Analytical and numerical solutions for statically indeterminate structures. Three lecture hours per week. **PREREQUISITE:** CIVL 3121, CIVL 3322.

# **CIVL 4131 - Intermediate Steel Design**

**Credit Hours:** (3) **Description:** Design of plate girders and composite beams; moment connections; current code provisions. Three lecture hours per week. **PREREQUISITE:** CIVL 3131.

# **CIVL 4135 - Reinforced Concrete Design**

**Credit Hours:** (3) **Description:** Strength analysis and design of reinforced concrete members; floor systems; current code provisions. Three lecture hours per week. **PREREQUISITE:** CIVL 3121, CIVL 3322.

# CIVL 4136 - Inter Reinforced Concrete Dsgn

**Credit Hours:** (3) **Description:** Design of two-way slab systems; column design including length effects; current code provisions. Three lecture hours per week. **PREREQUISITE:** CIVL 4135, **PREREQUISITE or COREQUISITE:** CIVL 4122.

# CIVL 4140 - Environmental Engr Design

**Credit Hours:** (3) **Description:** Detailed design of one component of an environmental engineering system with appropriate consideration of the interactions with the other components; design standards, procedures, and legal constraints. Three lecture hours per week. **PREREQUISITE:** CIVL 3140.

# **CIVL 4143 - Physical/Chemical Treatment**

**Credit Hours:** (3) **Description:** Basic physical-chemical treatment concepts including sedimentation, filtration, adsorption, neutralization, coagulation, air stripping, dissolved air flotation, disinfection, and ion exchange; application of basic concepts to design of water and wastewater treatment system components. Three lecture hours per week. **PREREQUISITE:** CIVL 3140.

# CIVL 4144 - Biological Wastewater Treatmnt

**Credit Hours:** (3) **Description:** Basic biological treatment concepts including biological kinetics, activated sludge, fixed-film systems, lagoon systems, and sludge digestion; application of basic concepts to design of biological wastewater treatment system components. Three lecture hours per week. **PREREQUISITE:** CIVL 3140.

# **CIVL 4149 - Pump Station Design**

**Credit Hours:** (3) **Description:** Detailed design of sumps, pumps, piping, valves, and controls associated with design of pumping systems for wastewater, process water, drinking water, storm water. **PREREQUISITE:** CIVL 3180. **COREQUISITE:** CIVL 3182.

# **CIVL 4151 - Soil Mechanics**

**Credit Hours:** (4) **Description:** Properties of soil and rock, including identification and classification, hydraulic properties, consolidation characteristics, and stress deformation-strength relationships. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** CIVL 3137.

# **CIVL 4152 - Applied Soil Mechanics**

**Credit Hours:** (3) **Description:** Subsurface exploration, foundation types, foundation construction, selection of foundation type and basis of design, earth retaining structures, and slope stability. Three lecture hours per week. **PREREQUISITE:** CIVL 4151.

# **CIVL 4155 - Pavement Design and Evaluation**

**Credit Hours:** (3) **Description:** Structural design of concrete and asphalt pavements, design of surface and subsurface pavement drainage; performance evaluation of existing pavements; pavement rehabilitation and pavement management. Three lecture hours per week. **PREREQUISITE:** CIVL 3137 or permission of instructor. **COREQUISITE:** CIVL 4151 or permission of instructor.

# CIVL 4162 - Traffic Engineering

**Credit Hours:** (3) **Description:** Traits and behavior patterns of road users and their vehicles. Includes traffic signs and signals, pavement markings, hazard delineation, capacity, accidents and parking analysis. **PREREQUISITE:** CIVL 3103, CIVL 3161.

# **CIVL 4163 - Airport Planning and Design**

**Credit Hours:** (3) **Description:** Aeronautical demand and air traffic control; airport and runway configuration; capacity and delay analysis, geometric design of runways and taxiways; airport access and parking; ground movements and baggage movements. Three lecture hours per week. **PREREQUISITE:** CIVL 3103, CIVL 3161.

# **CIVL 4164 - Route Location and Design**

**Credit Hours:** (3) **Description:** Elements of route location and design; emphasis on horizontal and vertical alignment, curvature, gradient and sight distance. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** CIVL 1101, CIVL 3161.

# **CIVL 4171 - Construction Engineering**

**Credit Hours:** (3) **Description:** Construction process and project management system; planning, cost estimating, bidding and scheduling construction projects; use of optimization techniques to control schedules and costs; computer applications. Three lecture hours per week. **PREREQUISITE or COREQUISITE:** CIVL 4111.

# CIVL 4180 - Adv Hydrology/Hydraulics

**Credit Hours:** (3) **Description:** Current methods and techniques used in hydrologic and hydraulic analysis for the design of water resources projects, watershed hydrology, flood plain management, and sediment transport. Three lecture hours per week. **PREREQUISITE:** CIVL 3181 or equivalent.

# CIVL 4190 - Water Resources Planning and Management

**Credit Hours:** (3) **Description:** Application of engineering principles to planning and management of multipurpose water resources projects, various physical components and appurtenances of water resources projects and economic, financial, and social feasibility of various purposes. Three lecture hours per week. **PREREQUISITE:** CIVL 3181 and CIVL 4111 or permission of instructor.

# **CIVL 4191 - Civil Engr Project**

**Credit Hours:** (1-3) **Description:** Independent investigation of a Civil Engineering problem in consultation with instructor. May be taken for a maximum of 3 hours credit toward graduation. **PREREQUISITE:** permission of instructor.

# CIVL 4195 - Professional Practice/Civil En

**Description:** Elements of professional practice in civil engineering, including basic concepts of management, business, public policy, and leadership. Ethics, professionalism, and professional licensure. Fee \$45 per hour Engineering Course Fee Two lecture hours per week. **PREREQUISITE or COREQUISITE:** CIVL 3131 or CIVL 4135, CIVL 3140, CIVL 3161, CIVL 3181, CIVL 4111, CIVL 4151

# **CIVL 4197 - Review/Engineering Fundamental**

**Credit Hours:** (0) **Description:** Review of general and civil engineering topics in preparation for taking the NCEES Fundamentals of Engineering Exam. Six laboratory hours a week for seven weeks. **PREREQUISITE or COREQUISITE:** CIVL 3131 or CIVL 4135, CIVL 3140, CIVL 3161, CIVL 3181, CIVL 4111, CIVL 4151, CIVL 4195. (S/U).

# CIVL 4199 - Civil Engr Design

**Credit Hours:** (3) **Description:** Design of a civil engineering system. Establishment of design objectives and criteria; synthesis and computer assisted analysis of alternatives; selection of optimum system design; preparation of detailed system descriptions including design sketches and engineering drawings and reports must be taken in student's final semester. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** CIVL 4195.

# CIVL 4211 - Physical Hydrology

**Credit Hours:** (4) **Description:** Movement, storage and development of groundwater; groundwater in the hydrologic cycle; aquifer characteristics and tests. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1040 and MATH 1830 or equivalent. *Cross listing:* ESCI 4211

# CIVL 4900-4910 - Special Topics in Civil Engineering

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

# **CIVL 4999 - Honors Thesis**

**Credit Hours:** (3) **Description:** Under the direction of a faculty member, the student writes and defends a thesis based upon background reading and research on a topic in civil engineering. **PREREQUISITE:** approval by the Honors Committee of the Department of Civil Engineering.

# CLAS 2481 - Mythology \*\*

1180 **Credit Hours:** (3) **Description:** Thematic study of classical myths and their function in ancient literature; emphasis on reading myths in ancient sources in translation. **[G]** 

# **CLAS 3021 - Medical Terminology**

**Credit Hours:** (3) **Description:** Origin and derivation of words used in medicine and the sciences; emphasis on building of scientific vocabulary.

#### CLAS 3413 - Greek Lit in Translation

**Credit Hours:** (3) **Description:** Reading and analysis of masterpieces of Greek literature in translation from Homer to Lucian; emphasis on development of literary types.

#### CLAS 3414 - Roman Lit in Translation

**Credit Hours:** (3) **Description:** Reading and analysis of masterpieces of Roman literature in English translation from origins to close of Silver Age; emphasis on genres of Roman literature.

# CLAS 4780 - Individual Study Classics

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of Classics chosen in consultation with instructor. Repeatable Repeatable for a maximum of 6 semester hours credit. **PREREQUISITE:** permission of instructor.

# **CLAS 4791 - Studies in Classics**

**Credit Hours:** (1-3) **Description:** Topics in classical literature and civilization. Repeatable May be repeated for maximum of 6 hours credit.

# **AVIA 1500 - Introduction to Flight**

**Credit Hours:** (1) **Description:** This course introduces students to the applicable sections of federal aviation regulations parts 61 and 91; airspace rules and procedures for the airport where the solo flight will be performed; and flight characteristics and operational limitations for the make and model of aircraft to be flown. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **COREQUISITE:** AVIA 1600 and AVIA 1601

# AVIA 1600 - Private Pilot Ground School

**Credit Hours:** (3) **Description:** This course is designed to develop the aeronautical knowledge and skills necessary to safely and proficiently exercise the responsibilities of an FAA certificate and/or rating for the Private Pilot certificate in order to meet the prerequisites specified in Title 14 CFR Part 61 for the FAA aeronautical knowledge written exam, Private Pilot – Airplane. This course must be taken with AVIA 1601 Private Pilot Flight. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI)

at the Millington Airport, Millington, TN. **COREQUISITE:** AVIA 1500 and AVIA 1601

# AVIA 1601 - Private Pilot Flight Lab

**Credit Hours:** (1) **Description:** Students must proficiently demonstrate and apply the aeronautical knowledge & skills learned in AVIA 1600 to meet the practical requirements specified in Title 14 CFR Part 61 for the FAA aeronautical knowledge flight test in order to earn the appropriate Private Pilot certificate – Airplane rating. This course must be taken with AVIA 1600 Private Pilot Ground School. This course covers all required airworthiness areas. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **COREQUISITE:** AVIA 1500 and AVIA 1600

# AVIA 1700 - Aviation Safety

**Credit Hours:** (3) **Description:** This course provides the student with a detailed introduction into all factors associated with aviation safety. Topics will include current aviation programs and why and how they originated. The student will learn the concepts of risk assessment and risk management. Throughout the course a review of accidents and accident investigations will be studied with a focus on causal and contributing factors and any resulting changes to processes to mitigate future risk. Students must be Commercial Aviation major to register.

# AVIA 1800 - Systems I: Basic Aircraft Systems

**Credit Hours:** (3) **Description:** This course provides an in-depth study of reciprocating engine, propeller, fuel, flight control, instrument, hydraulic, brake, wheels, and pressurization systems. The student will explore FAR Part 43 that covers aircraft maintenance, preventative maintenance, overhaul processes and alterations. Students must be Commercial Aviation major to register.

# AVIA 2100 - Aerodynamics

**Credit Hours:** (3) **Former:** *Formerly Theory of Flight.* **Description:** This course will provide the student with a study of the physical principles of fixed wing aircraft aerodynamics, thereby fostering an appreciation of the factors affecting aircraft performance, stability, control and special flight conditions. Topics will include aerodynamic fundamentals and terminology with emphasis on lift, weight, thrust and drag forces acting on an aircraft in flight. Students must be Commercial Aviation major to register.

# AVIA 2101 - Instrument/Commercial Flight Lab

**Credit Hours:** (1) **Description:** This course will cover flight instruments, FAA regulation, air traffic control procedures, radio navigation and aircraft operation and performance as applied to the practical aspects of instrument flying. At the end of this course the student should be proficient in instrument procedures such as holding patterns, instrument approaches and IMC (Instrument Meteorological Conditions) enroute navigation. Three instrument cross-country flights and review will prepare the student to attain the proficiency level of an 1181 instrument-rated pilot and successfully complete the Instrument Rating Flight check in the appropriate aircraft. Students must be a Commercial Aviation major to register. . Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate COREQUISITE:** AVIA 2200

# AVIA 2200 - Instrument/Commercial Ground School

**Credit Hours:** (3) **Description:** This course will provide the student with a detailed study of the regulations, procedures, and publications necessary for operating IMC (Instrument Meteorological Conditions) in the national airspace system. Terminal and enroute procedures will be studied in detail. Also included are aircraft instruments, FAA regulations, ATC procedures, radio navigation, radio phraseology, aircraft operations, and aircraft performance as applied to instrument flying and flight planning. Designed to help the student prepare for the FAA Written Examination – Instrument Rating. Students must be a Commercial Aviation major to register. . Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate COREQUISITE:** AVIA 2101

#### AVIA 2300 - Advanced Flight Lab

**Credit Hours:** (1) **Former:** *Formerly AVIA 4401 Flight Lab* **Description:** The course provides up to 50 hours of flight time to develop the student's cross-country proficiency and confidence. These lessons may also be utilized for additional dual instruction to meet the proficiency requirements for the end of course FAA practical test. It is also designed to meet the flight experience requirement of CFR 141 Appendix D. Students must be a Commercial Aviation major to register. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, and AVIA 2200. **COREQUISITE:** AVIA 3200, AVIA 3201

# AVIA 3200 - Commercial Ground School – Single Engine (ASEL)

**Credit Hours:** (3) **Description:** Procedures, operations, and regulations necessary to prepare the student for the FAA Commercial Pilot Airplane Written Examination. Includes the study of aircraft limitations, principles of flight, meteorology theory and weather services, weight and balance computations, use of performance charts, advanced flight planning, aeronautical decision making and judgment, night and high-altitude operations, and procedures for operating within the National Airspace System. Students must be a Commercial Aviation major to register. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, and AVIA 2200. **COREQUISITE:** AVIA 2300, AVIA 3201

# AVIA 3201 - Commercial Flight Lab – Single Engine (ASEL)

**Credit Hours:** (1) **Description:** The course builds upon previously learned ground and flight training. It uses the building block technique and the student will review and practice day and night cross-country procedures preparing for commercial pilot operations. The course provides a thorough introduction to pilot-in-command responsibilities at the commercial level. The student is also introduced to the operation of complex airplanes. The course culminates in a practical (flight) test given as a final exam by a FAA designated pilot examiner and conducted as specified in the FAA's Commercial Pilot Practical Test Standards. Students must be a Commercial Aviation Major to register. Flight fees are associated with this course. This course will be taught at Crew Training International CTI at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101 and AVIA 2200. **COREQUISITE:** AVIA 3200 **PREREQUISITE or COREQUISITE:** AVIA 2300

# AVIA 3300 - Commercial Ground School – Multi-Engine (AMEL)

**Credit Hours:** (2) **Description:** This course is designed to develop the knowledge and skills necessary to safely and proficiently exercise the privileges and responsibilities of a Commercial Pilot with a Multiengine rating. Included are multi-engine aircraft systems, aerodynamics, flight characteristics, weight and balance, aircraft performance, normal procedures and abnormal/emergency procedures with an emphasis on engine-out operations. Students must be a Commercial Aviation major to register. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, AVIA 2200, AVIA 2300, AVIA 3200, and AVIA 3201. **COREQUISITE:** AVIA 3301

# AVIA 3301 - Commercial Flight Lab Multi-Eng

**Credit Hours:** (1) **Description:** Dual flight instruction designed to prepare the student for the FAA Multi-engine Airplane Rating. The course provides a foundation for all relevant multi-engine maneuvers and procedures, cross-country, instrument and night flight training including normal and engine-out operations. The flight check will include normal and engine-out instrument approaches in the IMC environment. Students must be a Commercial Aviation major to resister. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, AVIA 2200, AVIA 2300, AVIA 3200, and AVIA 3201. **COREQUISITE:** AVIA 3300

# AVIA 3400 - Air Traffic Control and Airspace

**Credit Hours:** (3) **Description:** Students will be introduced to the Air Traffic Management System and National Airspace System, Navigational aids, Separation Minima between aircraft, and a general orientation to the world of Air Traffic Operations. The course will cover ATC procedures; Code of Federal Regulations as they relate to air traffic control processes; tower operations; normal operations; radar and non-radar operations; and differing types of environmental concerns within a given geographical area. Students must be Commercial Aviation major to register. **Credit Hours:** (3) **Description:** This course will provide an in-depth introduction to the turbine engine through the study of its development, theory of operation and the function of turbine engine

components. There are two basic types of turbine-powered aircraft and their engines; the turbo-propeller and the turbojet/turbofan. The course will discuss how both types were developed and the advantages and/or disadvantages of each. At the end of this course, you should be able to identify the parts of a turbine engine and explain its function. Students must be Commercial Aviation major to register.

# AVIA 4200 - Systems III: Transport Category Aircraft Systems

**Credit Hours:** (3) **Description:** This course provides an in-depth study of the complex systems of today's air transport jet aircraft. It provides a review of all primary systems, to include electric, flight controls, fuel, hydraulic, fire protection and warning, communications, Instruments, navigational and APU systems. The course will discuss the various types of transport category aircraft, the history behind their development, and future transport category aircraft programs. At the end of this course, the student should be able to identify and explain the various aircraft systems used in transport category aircraft. Students must be Commercial Aviation major to register.

#### **AVIA 4300 - Air Carrier Operations**

**Credit Hours:** (3) **Description:** This course examines the major areas of air carrier operations including ground, technical, flight and systems operations, regulations, dispatch functions, and pilot responsibilities. The course will examine the basic forms of airline operations existing today such as hub-and-spoke, short haul, regional, and point-to-point service. The course will review current industry events and trends with a focus on the airline industry of the future. The student will participate in Airline Pilot interview prep and interview technics. At the end of the course the student should be able to present himself/herself professionally and competently for airline pilot interviews. Students must be a Commercial Aviation major to register.

# AVIA 4550 - Aviation Law & Regulation

**Credit Hours:** (3) **Description:** This course is designed to introduce the student to the United States legal system and how it relates to aviation issues. The course will cover a broad range of topics related to aviation operations including Constitutional law, criminal law, International aviation law, commercial law as applied to aviation transactions, property law issues, and employment law as applied to aviation. The course covers Administrative Agencies such as the Federal Aviation Administration oversight and enforcement action authority and the National Transportation Safety Board. Students must be a Commercial Aviation major to register.

# AVIA 4560 - Aviation Physiology & Survival

**Credit Hours:** (3) **Description:** In this course, human physiological responses to the stresses of the flight environment will be examined in-

depth. Topics include decompression, hypoxia, spatial disorientation, altered pressure environments, fatigue, jet lag, sleep deprivation, selfimposed medical stress and emotional stress. The course will look at human factors and automation, inflight medical emergencies, health maintenance programs, medical standards, regulations and certification. The student will be exposed to basic introduction to wilderness survival. Students must be a Commercial Aviation major to register.

# AVIA 4700 - Flight Instructor Ground School

**Credit Hours:** (4) **Description:** This course provides the required areas of instructor knowledge to aid the student in preparing for the Fundamental of Instructing (FOI) knowledge test, and the Flight Instructor Airplane knowledge test. The course covers the fundamentals of teaching and learning, including effective teaching methods, learning processes, consideration of flight training syllabi, effective evaluations, and flight instructor responsibilities. Also included is the analysis of the flight maneuvers involved with Private Pilot, Commercial Pilot and Flight Instructor Certificates. Students must be a Commercial Aviation major to register. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, AVIA 2200, AVIA 2300, AVIA 3200, AVIA 3201, AVIA 3300, and AVIA 3301. **COREQUISITE:** AVIA 4701

#### **AVIA 4701 - Flight Instructor Certification**

**Credit Hours:** (3) **Description:** The course includes discussion, instruction and arranged practice in flight instruction in preparation for the FAA Flight Instructor Certification with an Airplane Single-Engine rating. The student will learn the analysis and performance of all the maneuvers required for private and commercial pilot certification from the right seat of the training airplane. Throughout the course the applicant will use proper single-pilot resource management (SRM) techniques and display effective aeronautical decision-making skills. Students must be a Commercial Aviation major to register. Flight fees are associated with this course. This course will be taught at Crew Training International (CTI) at the Millington Airport, Millington, TN. **PREREQUISITE: Private Pilot Certificate**, AVIA 2101, AVIA 2200, AVIA 2300, AVIA 3200, AVIA 3201, AVIA 3300, and AVIA 3301. **COREQUISITE:** AVIA 4700

#### AVIA 4800 - Human Factors & Crew Resource Management

**Credit Hours:** (3) **Description:** This course introduces the student to issues influencing human performance in the complex operational aviation environment. Theory and practical applications of cognitive processing, decision making, interpersonal interaction and communication will be presented. This course also introduces design elements intended to optimize man-machine interaction. The course explores how human factors relate to causes of previous aircraft accidents and how human factors are impacting the stellar safety record of the current air carrier industry. Students must be a Commercial Aviation major to register.

1183 **Credit Hours:** (1-9) **Description:** Internship experience offered through individual academic departments and programs within the College of Arts and Sciences as needed. **PREREQUISITE:** permission of instructor.

#### **IIS 1010 - Intro to Intelligent Systems**

**Credit Hours:** (3) **Description:** Understanding artificial and natural phenomena in fields like biology, psychology, neurosicence, economics, and engineering through computational concepts and practices.

#### **COMM 1010 - Survey of Mass Communication**

Credit Hours: (3)

#### COMM 1851 - Introduction to Film\*\*

**Credit Hours:** (3) **Description:** Comprehensive study of the forms, functions, and history of film art; emphasis on developing student's critical skills and aesthetic appreciation through analysis of complex formal, social, historical, and cultural dimensions of the art of film. **[G]** 

#### COMM 2020 - TV/Video/Radio Production Lab

**Credit Hours:** (1-3) **Former:** (1823) **Description:** Experiences in production of broadcast quality television studio, radio station, and remote productions. Students assume technical positions on a variety of assignments as productions assistants. Repeatable May be repeated for a maximum of 3 hours credit.

#### COMM 2100 - Communication Inquiry \*\*

**Credit Hours:** (3) **Description:** History and development of the discipline of communication; emphasis on rhetoric, social science, and media; theories and models of communication.

#### COMM 2101 - Media and Info Literacy \*\*

**Credit Hours:** (3) **Description:** Critical examination and analysis of media and information products; focus on mediated construction of meaning and assessment of credibility online and in traditional mass media; basic research skills necessary to complete academic projects successfully.

#### COMM 2381 - Oral Communication \*\*

**Credit Hours:** (3) **Description:** Principles and practices of effective communication in personal, professional, and public contexts; emphasis on researching, analyzing, writing, and delivering effective spoken messages for informative and persuasive purposes. **[G]** 

High Impact Practice Code: Study Abroad

#### COMM 3001 - Rhetoric/Civic Controversy \*\*

#### CAS 4800 - Internship

**Credit Hours:** (3) **Description:** Introduction to history and practice of rhetoric as the art of civic engagement in a democracy; focus on key terms, ethical assumptions, and interpretative tools of rhetoric study; analysis of contemporary and historical cases in local and national controversy.

# COMM 3003 - Television and Culture\*\*

**Credit Hours:** (3) **Former:** (3861) **Description:** Social, political, and aesthetic dimensions of television in contemporary culture.

# COMM 3012 - Health Communication \*\*

**Credit Hours:** (3) **Former:** (4012) **Description:** Examination of the role of communication in health care; application of communication theory and practice to the health care context from provider-patient interaction to cultural influences on health.

# COMM 3100 - Communication Ethics \*\*

**Credit Hours:** (3) **Description:** Exploration of principles, theories, and philosophical approaches to ethics of human communication; emphasis on decision-making, critical thinking and awareness of personal responsibilities as a sender and receiver of messages.

# COMM 3321 - Argumentation and Advocacy \*\*

**Credit Hours:** (3) **Description:** Theories of argumentation with an emphasis on developing skills in analyzing, reasoning, and using evidence in political advocacy. Students will learn the role of advocacy, debate, and deliberation in public decision-making. **PREREQUISITE:** COMM 2381.

# COMM 3322 - Theories of Persuasion \*\*

**Credit Hours:** (3) **Description:** Principles underlying communication designed to influence attitudes or behavior; approaches to motivation, perception, message structure, attention, reasoning, audience analysis, persuasability, and attitude change; items for analysis drawn from speeches, advertising, radio, television, and film.

# COMM 3330 - Communication Research Methods

**Credit Hours:** (4) **Description:** Examination and application of qualitative and quantitative methods of research. Three hours of lecture, one hour of laboratory per week. **PREREQUISITE:** COMM 2100 and COMM 2101.

# **COMM 3341 - Discussion**

**Credit Hours:** (3) **Description:** Study and practice of principles and techniques of discussion, dealing with current problems of wide interest and significance.

**Credit Hours:** (3) **Description:** Relationship between communication variables and leadership styles and effectiveness in various organizational and group settings.

# **COMM 3360 - Rhetoric of Pop Culture**

**Credit Hours:** (3) **Description:** Investigation of rhetorics of U.S. culture; focus on how constructions of class, gender, race, and sexuality work in contemporary television, film, music, and advertising.

#### COMM 3361 - African-American Rhetoric \*\*

**Credit Hours:** (3) **Description:** Speeches and rhetoric of African-Americans; emphasis on spokespersons such as Walker, Turner, Douglass, Washington, DuBois, Malcolm X, King, Davis, and Jackson.

#### COMM 3400 - Storytelling and Life

**Credit Hours:** (3) **Description:** This course uses film, both documentary and narrative as an access point to start a conversation about the power of story and to introduce each student to the story they are telling in thier lives.

#### **COMM 3561 - Gender in Communication**

**Credit Hours:** (3) **Description:** This class provides a foundation of gender theories used in communication research and applies these theories and concepts to the way gender becomes instituted within our culture. The class deals with institutions such as family, religion, work, education, media, and government. Students will gain a better understanding of the role communication plays in the formation, navigation, maintenance and disruption of institutional gender expectations and norms.

#### **COMM 3800 - Media Industries**

**Credit Hours:** (3) **Description:** Overview of economic structure of media industries, including role of regulation and impact of media organizations on society.

# **COMM 3801 - TV Production Technique/JOUR**

**Credit Hours:** (3) **Description:** For majors in the broadcast journalism sequence; basic principles and techniques of video production with production exercises. **PREREQUISITE:** permission of instructor.

#### **COMM 3820 - Broadcast Prep and Performance**

**Credit Hours:** (3) **Description:** Skills required for on-air performance in broadcasting and cable emphasizing use of voice and copy preparation; presentation of public affairs programming, talk show hosting, sportscasting, newscasting and general announcing.

# COMM 3821 - Audio Narratives

#### COMM 3342 - Communication and Leadership

**Credit Hours:** (3) **Description:** Basic principles and practices in storytelling for radio, the Internet, and new media; lecture and laboratory course using digital audio workstations for producing, recording, and editing.

#### COMM 3823 - Motion Picture Prod I

#### Credit Hours: (4)

**Description:** Basic production skills and theory; still and 16 mm motion picture photography; film editing; hands-on production exercises.

# COMM 3824 - Motion Picture Prod II

**Credit Hours:** (4) **Description:** Continued production skills and theory utilizing digital cameras and and digital post production; extensive production exercises. **PREREQUISITE:** minimum grade of "C" in COMM 3823, or permission of instructor.

# COMM 3842 - TV Studio Production I

**Credit Hours:** (4) **Description:** Techniques of studio TV production, including staging and direction of programs. **PREREQUISITE:** minimum grade of "C" in COMM 3823 or permission of instructor.

# COMM 4011 - Communication in Organizations \*\*

**Credit Hours:** (3) **Description:** Study of communication systems and problems in contemporary organizations with emphasis on the role of communication in corporate culture and organizational change.

# **COMM 4013 - Political Communication**

**Credit Hours:** (3) **Description:** Investigation of various forms of political communication; texts drawn primarily from current political disputes in the U.S.; focus on improving basic skills of critical thinking and writing about civic life.

# COMM 4014 - Communication on the Internet \*\*

**Credit Hours:** (3) **Description:** Research and theories examining role of internet and new technologies in everyday interaction; interpersonal and group communication, language change, online communities and social networks, identity and self-presentation online.

# COMM 4015 - Health Literacy

**Credit Hours:** (3) **Description:** Development of health literacy as an area of concern in healthcare including patient/provider interactions, public health campaigns, health education, healthcare reform, and health insurance.

# COMM 4016 - Public Health Campaigns

1185 **Credit Hours:** (3) **Description:** Examination of the fundamentals of public health communication as well as the latest public health communication innovations, tools, technologies, research and strategies.

#### COMM 4210-4219 - Special Topics In Communication Studies

**Credit Hours:** (1-3) **Description:** Topics are varied and announced in online class listings. Repeatable May be repeated for a maximum of 9 hours credit when topic varies.

#### COMM 4220-4229 - Special Topics in Film

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated for a maximum of 9 hours credit when topic varies.

# COMM 4340 - Listening

**Credit Hours:** (3) **Description:** Exploration of communication theory and practice from perspective of listening; philosophical, practical, personal dimensions of listening as an art of being as well as a mode of doing.

# COMM 4341 - Interpersonal Communication \*\*

**Credit Hours:** (3) **Description:** Theory, research and practice regarding dyadic communication.

# **COMM 4342 - Small Group Communication**

**Credit Hours:** (3) **Description:** Study of group communication theory emphasizing group membership, member perceptions, group development, group processes, and group outcomes.

# **COMM 4360 - American Eloquence**

**Credit Hours:** (3) **Description:** Examination of notable public discourse from before founding of the republic through twentieth century; religious and secular foundations of American rhetoric; tensions of inclusion and exclusion in development of national self-understanding.

#### COMM 4363 - Dialogue

**Credit Hours:** (3) **Description:** Theoretical, philosophical and practical exploration of dialogic communication and relations.

# **COMM 4364 - Gendered Public Discourse**

**Credit Hours:** (3) **Description:** History of gender topics in U.S. public discourse. The course covers gender and rhetorical theory analyzing the social and cultural significance gendered voices and topics have played

and continue to play in US history. Focus is given to various 19th, 20th and 21st century issues.

# COMM 4365 - Place/Community/Communication

**Credit Hours:** (3) **Description:** Exploration of interrelationships between human interaction, created places and natural world; emphasis on communication environment, broadly conceived, and its effect on community.

# COMM 4373 - Interracial Communication\*\*

**Credit Hours:** (3) **Description:** Special problems encountered in communication among races; readings, discussion, and field study of how prejudice, stereotypes, and self-concepts can affect communication; exploration of methods to minimize these problems.

# COMM 4374 - Studies in Communication Arts \*\*

**Credit Hours:** (1-3) **Description:** Independent research in areas of special interest of communication, broadcast and electronic media, and film and video. **PREREQUISITE:** permission of instructor.

# COMM 4375 - Intercultural Communication \*\*

**Credit Hours:** (3) **Description:** Special problems encountered in communication among people of different cultural backgrounds; focus on understanding communication between and among people with different national/cultural backgrounds and functioning more effectively in multicultural settings.

#### COMM 4380 - Communication and Conflict \*\*

**Credit Hours:** (3) **Description:** Theories and methods of conflict management and resolution focusing on practical communication skills.; concepts of perception, listening and peacemaking emphasized.

# COMM 4381 - Senior Capstone \*\*

**Credit Hours:** (3) **Description:** Synthesis and extension of knowledge in communication studies; demonstrated integration of learning and positioning to move on as individuals, citizens, and/or professionals. Students will create a portfolio representing past course projects as well as carry out a capstone research project. **PREREQUISITE:** COMM 3330, and senior standing, or permission of instructor.

#### **COMM 4400 - Contemplative Communication**

**Credit Hours:** (3) **Description:** Non-analytical approach to communication theory and practice; holistic-communal perspective of relational experience; benefits of silence, stillness and solitude are interrelated with the values of openness, receptiveness and responsiveness.

**Credit Hours:** (1-3) **Description:** Field studies in communication. Supervised practical work with government institutions, nonprofit organizations, private business, film companies, and broadcast and electronic media firm. Written analysis of experience required. Repeatable May be repeated for maximum of 6 hours credit. **PREREQUISITE:** permission of instructor. (S/U).

#### COMM 4811 - Media 2.0

**Credit Hours:** (3) **Description:** Examination of long tail phenomenon and other theories behind convergent media; people and organizations producing and distributing work on the Internet and other alternative channels; new distribution forms challenges and assumptions about how mass media should and does work.

#### COMM 4822 - Audio Production Film/Video

**Credit Hours:** (3) **Description:** Intermediate principles and practices of audio (recording, editing, mixing, and design) with emphasis on film and video production. **PREREQUISITE:** A minimum grade of "C" in COMM 3824, or permission of instructor.

#### COMM 4824 - Cinematography

**Credit Hours:** (3) **Description:** Art of visual interpretation with strong concentration in theory and techniques of lighting. Experience with professional cameras and lighting equipment. **PREREQUISITE:** A minimum grade of "C" in COMM 3824, or permission of instructor.

#### **COMM 4825 - Editing/Post Production**

**Credit Hours:** (3) **Description:** Aesthetics of continuity development in a variety of editing styles; editing techniques and post-production procedures. **PREREQUISITE:** A minimum grade of "C" in COMM 3824, or permission of instructor.

#### **COMM 4841 - Television Workshop**

**Credit Hours:** (3) **Description:** Television Workshop (3). TV studio production. Repeatable May be repeated for a maximum of 6 semester hours; repetition will not result in a change of any grade previously given. **PREREQUISITE:** COMM 3842 or permission of instructor.

#### **COMM 4842 - TV Studio Production II**

**Credit Hours:** (4) **Description:** Advanced training in TV studio/multiple camera techniques; extensive production work. **PREREQUISITE:** COMM 3842.

#### COMM 4850 - Film History I

**Credit Hours:** (3) **Description:** Historical survey of motion pictures from medium's pre-history to 1940; emphasis on narrative film.

# COMM 4851 - Film History II

**Credit Hours:** (3) **Description:** Historical survey of the major movements, genres, and themes in narrative film from 1940 to 1980.

# **COMM 4853 - Documentary Form Film**

**Credit Hours:** (3) **Description:** Development of non-fiction film as rhetorical and expressive form; analysis of individual films, genres, and filmmakers.

#### **COMM 4854 - Documentary Form Broadcasting**

**Credit Hours:** (3) **Description:** History, theory, and criticism of nonfiction broadcasting, including docudrama and television documentaries.

#### COMM 4856 - Gender and Film

**Credit Hours:** (3) **Description:** Examines how gender, and consequently race and sexuality, are represented in film. Specific attention is given to feminist approaches in film studies.

#### **COMM 4858 - Contemporary Cinema**

**Credit Hours:** (3) **Description:** Major themes and styles in international and U.S. narrative film from 1980 to present.

#### **COMM 4859 - Monster Films**

**Credit Hours:** (3) **Description:** Survey of classic and contemporary monster films exploring monstrosity as a social and cultural category for organizing, classifying, and managing change.

# COMM 4860 - Reality TV \*\*

**Credit Hours:** (3) **Description:** Examine and critically evaluate the many facets of Reality TV; attempt to identify the roots of our increasingly voyeuristic society, understand the production values of reality-based programs, and speculate as to what the future holds.

# **COMM 4861 - Science Fiction Film**

**Credit Hours:** (3) **Description:** This course will examine science fiction and styles of international and U.S. narrative film from 1960s to present. The course argues that science fiction has become one of the most important genres of contemporary cinema. The course asks how science fiction cinema has dealt with uncertainties of modern day life, including, but not limited to, human extinction, technological advances, and robotic and cyborg entities.

#### COMM 4891 - Directing for Film

**Credit Hours:** (3) **Former:** (Producing/Directing Film/Video) **Description:** This class deals with essential elements of directing dramatic action for film. Focus on scene analysis, blocking for the camera, and working with actors. Coverage of important readings, intensive production work, and extensive written preparation by students when directing, and committed production by students when not directing. Fee Broadcast and Film. **PREREQUISITE:** Minimum grade of 'C' in COMM 3824 or permission of instructor.

#### COMM 4892 - Film/Video Production

**Credit Hours:** (1-3) **Description:** Film and video production workshop. Class members write, produce, direct, or assume crew responsibilities on productions. Repeatable May be repeated for a maximum of 6 hours credit. See departmental guidelines for independent production requirements and procedures. **PREREQUISITE:** COMM 3824 and permission of instructor.

# **COMM 4893 - Producing for Film**

**Credit Hours:** (3) **Description:** The goal of this course is to acquaint the student with the overall film/video making process through the lens of the producer - how to take a film idea from conception to completion. Examine in depth the world of the producer as s/he finds and sells a concept, budgets, schedules, assembles a crew, oversees post-production, and markets his/her project. Explore how the producer operates in the "Hollywood" system – from dealing with agents and managers to finding talent and developing screenplays. Hands-on approach the learning essential tools of an aspiring executive/producer in Hollywood. Fee Production course fee applies. **PREREQUISITE:** COMM 3824 or permission of instructor. *Cross listing:* COMM 6893

#### **COMM 4894 - Community Action Filmmaking**

**Credit Hours:** (3) **Description:** Students work together to make short films that promote the work of not-for-profit organizations that benefit the community. Production work outside of class time will be required. Fee Broadcast and Film. **PREREQUISITE:** COMM 3824 or permission of instructor.

#### **COMM 4960 - Documentary Writing**

Credit Hours: (3) Description: Writing for non-fiction media.

#### **COMM 4970 - Screenwriting**

**Credit Hours:** (3) **Description:** Writing for fiction film and television; basic dramatic theory, narrative structure, characterization, dialogue, adaptation, and the unique demands of audiovisual media.

#### **COMM 4980 - Honors Studies**

**Credit Hours:** (3) **Description:** Reserved for students enrolled in Communication Honors Program. Repeatable May be repeated for a maximum of 15 hours credit. **PREREQUISITE:** permission of Director of Communication Honors Program.

#### COMM 4982 - Honors Seminar

**Credit Hours:** (3) **Description:** Intensive study of particular problems in communication. Repeatable May be repeated for a maximum of 12

hours credit when semester topics vary. **PREREQUISITE:** permission of Director of Communication Honors Program.

#### **COMM 4993 - Senior Practicum**

**Credit Hours:** (3) **Description:** Independent work in radio, video, or film production. Each student has complete creative control of a program from conception through final product. See departmental guidelines for independent production requirements and procedures. **PREREQUISITE:** permission of instructor.

#### **COMM 4999 - Senior Honors Thesis**

**Credit Hours:** (3) **Description:** Supervised independent research project. Open only to students enrolled in the Communication Honors Program. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of Director of Communication Honors Program.

# AUSP 1010 - Intro Amer Sign Lang I

**Credit Hours:** (3) **Former:** (4201) **Description:** Basic comprehension and expressive skills in American Sign Language (ASL), including vocabulary, grammar, and finger spelling. Includes in- and out-of-class practice and practical applications. **PREREQUISITE:** No prerequisite.

#### AUSP 1020 - Intro Amer Sign Language II

**Credit Hours:** (3) **Former:** (4202) **Description:** Further development of production and comprehension of ASL, including vocabulary, grammar, sentence structures, conversational strategies, and cultural/linguistic aspects. **PREREQUISITE:** AUSP 1010

# AUSP 2001 - Introduction to Communication Sciences and Disorders

**Credit Hours:** (3) **Description:** This course is designed to introduce the broad field of Communication Sciences and Disorders by exploring the areas of treatment, populations that are served, and settings in which individuals with Communication Disorders and Differences are served.

# AUSP 2010 - Inter Amer Sign Language I

**Credit Hours:** (3) **Former:** (4203) **Description:** Development of visual-spacial (gestural) skills and improvement of expressive fluency and receptive skills. The use of lexicalized signs and fluency/accuracy of finger-spelling will be developed. **PREREQUISITE:** AUSP 1020

# AUSP 2020 - Inter Amer Sign Language II

**Credit Hours:** (3) **Former:** (4204) **Description:** Continued development of conversational ASL skills, expressive fluency, and receptive skills. The use of lexicalized signs and fluency of fingerspelling will be honed. **PREREQUISITE:** AUSP 2010

# AUSP 3010 - Advanced American Sign Language

**Credit Hours:** (3) **Description:** This course continues development of conversational skills, receptive skills, and expressive fluency in American Sign Language. **PREREQUISITE:** AUSP 2020

#### AUSP 3020 - Advanced Fingerspelling

**Credit Hours:** (3) **Former:** AUSP 1015 **Description:** This course will develop expressive and receptive fingerspelling skills that focus on whole-word and phrase recognition as well as identifying fingerspelling words in context and developing speed, clarity, and fluency. **PREREQUISITE:** AUSP 2020

#### AUSP 4001 - Accent Modification

**Credit Hours:** (1) **Description:** This course is an individually directed study of standard pronunciation, stress patterns, and intonation of American English for speakers of English as a foreign language. It is focused toward students who desire to improve their speech intelligibility in American English. Permission of instructor required. (S/U).

#### AUSP 4006 - Language & Speech Development

**Credit Hours:** (3) **Description:** Normal acquisition of speech and language in young children, contemporary theories of language acquisition, bilingual differences, and early literacy and play skills. *Cross listing:* AUSP 6006

# AUSP 4106 - Introduction to Audiology

**Credit Hours:** (3) **Description:** Introduction to anatomy and physiology of the ear; the etiology, pathology and treatment of hearing loss; and the education implications of hearing loss; also introduces hearing assessment techniques, including audiogram interpretation.

# AUSP 4205 - ASL for Speech, Audio, & Educ

**Credit Hours:** (3) **Description:** This course presents (1) basic vocabulary and grammar of American Sign Language appropriate for use in the classroom and therapy setting and (2) specific topics, information, and strategies that provide exposure to elements of Deaf Culture and the Deaf community for speech-language pathologists, audiologists, and educators

#### AUSP 4206 - Deaf Culture and Deaf History

**Credit Hours:** (3) **Description:** This course is designed to introduce the most important aspects of the American Deaf experience by exploring the history, contributions, and contemporary lives of Deaf people in America *Cross listing:* Cross listed at 4000/6000 level.

# AUSP 4207 - Psychological, Sociological, and Educational Perspectives of Deafness

**Credit Hours:** (3) **Description:** This class focuses on multiple perspectives including psychological, sociological, and educational issues from the point of view of d/Deaf adults and professionals in these fields who work with the d/Deaf. **PREREQUISITE:** AUSP 1010 or AUSP 4205/6205. *Cross listing:* AUSP 6207

# AUSP 4208 - Introduction to Interpreting ASL

**Credit Hours:** (3) **Description:** This course guides the student through the process necessary for becoming a qualified interpreter in a market that is rapidly changing by providing a broad base of knowledge that addresses current trends and promotes critical thinking and open dialogue about the necessary competencies, conditions, boundaries and ethics to become an interpreter. **PREREQUISITE:** AUSP 1010, AUSP 1020, and AUSP 3020

# AUSP 4209 - Linguistics in American Sign Language

**Credit Hours:** (3) **Description:** This course defines language and linguistics as it refers to American Sign Language focusing on the primary traditions 0f communication, pattern formation, and cognition. **PREREQUISITE:** AUSP 2010

# AUSP 4300 - Autism: Communication and Socialization

**Credit Hours:** (3) **Description:** Nature and origin of autism, presenting up-to-date information about proposed causes, both genetic and environmental. The course will also provide a view of progress made in treatment of autism, especially when identification of the disorder can be made early in life.

# AUSP 4301 - Survey of Neurological Disorders for Rehabilitation Professionals

**Credit Hours:** (3) **Description:** An applied interprofessional framework will be used throughout the course to integrate neuropathology and basic understanding of neural structure and function with the teamwork and communication skills needed to work effectively on a health care team. Invited professionals with expertise in a variety of neurological disorders will provide interprofessional clinical-case experiences. *Cross listing:* AUSP 6301

# AUSP 4400-4410 - Special Topics in Audiology and Speech Pathology

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing.

# AUSP 4800 - Independent Study in American Sign Language

**Credit Hours:** (1-3) **Description:** Exploration of emerging topics in American Sign Language and their implication on the changing social,

1189 cultural, political, economic and spiritual needs and goals of the Deaf. **PREREQUISITE:** AUSP 2010

# AUSP 4900 - ASL/Deaf Studies Field Experience

**Credit Hours:** (1-6) **Description:** Offers students authentic experiences using American Sign Language in the broader community. **PREREQUISITE:** Degree-seeking student in ASL and Deaf Studies, AUSP 2020, permission of advisor. *Cross listing:* NA

# **CCFA 3001 - Arts In Education**

**Credit Hours:** (3) **Description:** Integrates art, music, and drama with other subject areas to stimulate creativity and build positive attitudes.

# CCFA 4001 - Arts/Schools Institute

**Credit Hours:** (1) **Description:** Provides West Tennessee educators the opportunity to discover and explore the impact of aesthetic education; students will view performances and exhibits and experience in-depth, hands-on exploratory workshops led by teaching artists.

# CCFA 4100 - CFA Internship \*\*

**Credit Hours:** (3) **Description:** Extensive professional preparation in a working environment in an area encompassed by the College of Communication and Fine Arts. Students must have already completed another internship within a department of CFA. Permission of student's department chair and the dean of the College of Communication and Fine Arts, and approval of the internship contract. Repeatable Course may be repeated for up to 6 hours. **No** 

# COMP 1000 - Computing for All

**Credit Hours:** (3) **Description:** An Introduction to computational thinking and computing applications, including creative problem solving, graphic novels, digital arts, social media, artificial intelligence, and impacts of computing on society. NOTE: This course may not be used as a COMP elective to fulfill the requirements of the major or minor in Computer Science.

# COMP 1100 - Intro Video Game Programming

**Credit Hours:** (3) **Description:** Introduction to basic programming in the context of building two dimensional (2D) games using the GameMaker 2D game engine. Students will complete stand-alone executable games that can be played with friends and added to their digital portfolios. Windows laptop computer required. NOTE: This course may not be used as a COMP elective to fulfill the requirements of the major or minor in Computer Science.

# COMP 1800 - Problem Solving/Computers

**Credit Hours:** (3) **Description:** Fundamental aspects of problem solving within the context of computer programming; techniques for deriving problem solutions and use of basic programming concepts

such as loops, conditionals, and variables; basics of high-level programming language. NOTE: this course may not be used as a COMP elective to fulfill the requirements of the major or minor in Computer Science. (F, Sp)

# COMP 1900 - CS1:Intro Comp Science

**Credit Hours:** (4) **Former:** (TBR: CISP 1010) **Description:** Overview of computer science as a field; problem-solving strategies with emphasis in fundamental programming skills, primitive data types, control structures, arrays, strings, I/O, basic recursion, documentation, testing and debugging techniques; introduction to object-oriented concepts Three lecture hours, two laboratory hours per week. **PREREQUISITE or COREQUISITE:** MATH 1910 or MATH 1421 (or MATH 1830 for COMP minors)

# **COMP 1950 - Ethics and Technology**

**Credit Hours:** (1) **Description:** Ethical and leadership issues for computing professionals including professional codes of ethics, privacy, cybersecurity, and intellectual property.

### COMP 2150 - CS2: OOP and Data Structures

**Credit Hours:** (4) **Description:** Principles of object-oriented programming and software development; problem solving with recursion and abstract data types, including linked lists, stacks, queues, binary search trees, hash tables; basic GUIs. **PREREQUISITE:** MATH 1910 or MATH 1421 (or MATH 1830 for COMP minors) and COMP 1900.

#### **COMP 2700 - Discrete Structures**

**Credit Hours:** (4) **Description:** Elementary logic; sets, relations, functions, equivalence relations, permutation, combinations, mathematical induction, recurrence relations, graph algorithms. students may not receive credit for both COMP 2700 and MATH 2702. **PREREQUISITE:** MATH 1910 or MATH 1421 (or MATH 1830 for COMP minors), and COMP 1900.

# **COMP 3115 - Database Process and Design**

**Credit Hours:** (3) **Former:** (4115) **Description:** Information representation, storage and retrieval; database processing and architecture; conceptual data modeling and data design; logical data models; relational models, operations and algebra; query languages and SQL; normalization and schema refinement; basic indexing techniques (hashing and B+trees). **PREREQUISITE:** COMP 2150, or permission of instructor.

# COMP 3150 - Programming in C/C++

**Credit Hours:** (3) **Description:** Introduction to C/C++; software development environments; primitive data types, pointer, reference, struct; user defined structures; memory management; control statements; function; file I/O; introduction to object-oriented programming; C++ class; input and output with streams; inheritance,

overriding, polymorphism; Standard Template Library. **PREREQUISITE:** COMP 2150, or permission of instructor.

### COMP 3160 - Adv Data Struct/Algorithm

**Credit Hours:** (3) **Description:** Review of data structures and objectoriented concepts; implementation of advanced data structures and related algorithms; graphs; trees, binary search trees; advanced sorting, hashing. **PREREQUISITE:** COMP 2150, COMP 2700.

# COMP 3410 - Computer Org/Architecture

**Credit Hours:** (4) **Description:** Basic concepts in assembly language programming, including logic, comparing and branching, interrupts, macros, procedures, arrays, program design, testing, debugging, loading, and linking; combinational, arithmetic and logical circuits ALU; memory circuits, latches, flip-flops, registers; computer structure; fetch-execute cycles, clocks and timing; microprogramming and microarchitecture; data path, timing, sequencing; cache memory organization; RISC architectures. **PREREQUISITE:** COMP 2150.

# COMP 3825 - Network/Info Assurance

**Credit Hours:** (3) **Description:** Net-centric computing; communication and networking; world-wide web; multimedia networking; network management; basic issues in computer security; threat modeling; basic methods and protocols in cryptography; web security; security; security policies; etiquette and cyberethics. **PREREQUISITE:** MATH 4614 or permission of instructor.

# **COMP 4001 - Intro to Python Programming**

**Credit Hours:** (3) **Description:** Basic concepts in computer programming; incorporates object oriented concepts, variables, flow control statement, arrays and lists, debugging and testing. NOTE: This course may not be used to fulfill requirements for the Computer Science major or Computer Science minor.

# COMP 4005 - Web Design/Development

**Credit Hours:** (3) **Description:** Web interface development using HTML, XML, CSS, JavaScript, and AJAX ; technological issues in web page design and data visualization; web servers and their features; web services. NOTE: This course may not be used to fulfill requirements for the Computer Science major or Computer Science minor. **PREREQUISITE:** COMP 4001, or one other course in computer programming, or permission of instructor.

# **COMP 4014 - Intro Java Programming**

**Credit Hours:** (3) **Description:** Java problem-solving strategies with emphasis in fundamental programming skills, primitive data types, control structures, arrays, strings, I/O, basic recursion, documentation, testing and debugging techniques; introduction to object-oriented concepts. NOTE: this course may not be used to fulfill requirements for the Computer Science major or Computer Science minor. (F, Sp)

# COMP 4019 - Competitive Prog/Tech Intrview

**Credit Hours:** (1) **Description:** Covers skills needed for participating in programming competitions and for whiteboard-coding interviews at large tech companies. Topics include practicing with online judges, applying known algorithms and standard library data structures, common problem categories, implementation strategies, and mock interviews. (Fall) **PREREQUISITE:** COMP 2150 or permission of instructor. *Cross listing:* COMP 6019

# COMP 4030 - Design/Analysis Algorithms

**Credit Hours:** (3) **Description:** Asymptotic behavior of programs, basic paradigms in algorithm design; greedy, divide-andconquer, dynamic programming; analysis of efficiency and optimality of representative algorithms, including graph, pattern matching, numerical, randomized, and approximation algorithms; approaches to lower bound analysis; basic parallel algorithms. (F, Sp) **PREREQUISITE:** COMP 2700, or permission of instructor.

# **COMP 4040 - Programming Languages**

**Credit Hours:** (3) **Description:** Comparative features, syntax and applicability of high-level programming languages such as FORTRAN, PASCAL, LISP, Scheme, ADA, C, C++, JAVA, PHP, JavaScript, Perl, Prolog, FORTH; data types, data structures, dataflow; procedures, recursion, runtime environment, string manipulation, list processing, array processing, documentation, programming style. (F, Sp) **PREREQUISITE:** COMP 2150, or permission of instructor.

# **COMP 4041 - Intro To Compilers**

**Credit Hours:** (3) **Description:** Finite state recognizers, lexical scanners, symbol tables context free methods such as recursive descent; LL(K), precedence, LR(K), SLR(K); language translation, generation and improvement of machine independent codes, inherited and synthesized attributes, syntax-directed translation schema. (Sp) **PREREQUISITE:** COMP 3410, COMP 4040, COMP 4030.

# **COMP 4081 - Software Engineering**

**Credit Hours:** (3) **Description:** Scope of software engineering; software life cycle models; software process; team organization; requirements analysis and design methodologies; metrics, inspections, testing strategies and maintenance; software risks; professional and ethical responsibilities. Computer Science majors should plan to take COMP 4882 during the following spring semester. It is recommended that students take COMP 3115 before taking this course. **PREREQUISITE:** COMP 2150, permission of instructor. *Cross listing:* (Same as EECE 4081)

# **COMP 4118 - Introduction to Data Mining**

**Credit Hours:** (3) **Description:** an introductory exploration of data mining. Topics include data preparation and preprocessing; association rules; classification; clustering; dimension reduction; recommendation

1191 engines; mining social network graphs. **PREREQUISITE:** COMP 2150 or permission of instructor.

### **COMP 4151 - Intro to Data Science**

**Credit Hours:** (3) **Description:** A hands-on and programmingintensive introduction to data science and applications of data mining and machine learning techniques to analyze real data sets. Specific topics include data collection, cleaning, manipulation, and visualization, clustering and developing models to make predictions, and ethical aspects of data science. **PREREQUISITE:** COMP 2150, and MATH 4614 or MATH 4635; or permission of instructor. *Cross listing:* 6151

# **COMP 4242 - Intro Computer Graphics**

**Credit Hours:** (3) **Description:** Characteristics of graphics I/O devices; 2D/3D transformation including scaling, translation and rotation; graphics pipeline; data structures for graphics; geometry representation; OpenGL programming; vertex processing; lighting and shading; rasterization including line and polygon drawing; ray casting; ray tracing; computer graphics in games; visualization. **PREREQUISITE:** COMP 3150 and MATH 3242, or permission of instructor.

# **COMP 4270 - Operating Systems**

**Credit Hours:** (3) **Description:** Hierarchy of storage devices, I/O buffering, interrupts, channels; processor and job scheduling, memory management: paging, segmentation, and virtual memory; interrupt procedure calls; multiprogramming, data races in shared resources, semaphores, concurrency, management of asynchronous processes and synchronization; security and recovery procedures. (F, Sp) **PREREQUISITE:** COMP 2150, and either COMP 3410 or EECE 4278, or permission of instructor.

# COMP 4272 - System Admin and Unix Prog

**Credit Hours:** (3) **Description:** Fundamental of UNIX and operating systems principles; principles and practices of systems administration and management; network file systems; account management; OS installation; startup and shutdown, booting, backup, restore; system administration tools; web administration; duties and responsibilities of a system administrator. (Sp)

# COMP 4302 - Web Service/Internet

**Credit Hours:** (3) **Description:** Design and implementation of web services; internet architecture and protocol layering; clientserver application design; peer-peer application design; World Wide Web programming using HTML, XML, Java and advanced scripting languages; security issues. (Sp) **PREREQUISITE:** COMP 3115, or permission of instructor.

# **COMP 4310 - Wireless Mobile Comp**

**Credit Hours:** (3) **Description:** Internet architecture and design; IPv4 and IPv6; routing algorithms, TCP congestion control; peer-to-peer applications, wireless LAN, mobile IP, mobile ad hoc networks; wireless sensor networks. (F) **PREREQUISITE:** COMP 3825.

# **COMP 4410 - Computer Security**

**Credit Hours:** (3) **Description:** Confidentiality, integrity, availability, methods and protocols in cryptography, digital signature, authentication, bit commitment; security in computing, programs, databases, operating systems; secure communication, secure channel, public key infrastructure, certificates; digital evidence, forensics tools; monitor and response; legal and ethical issues; risk management, security administration. (F) **PREREQUISITE:** COMP 2150 or permission of instructor.

# COMP 4420 - Network and Mobile Security

**Credit Hours:** (3) **Description:** Security issues and solutions in wireless and mobile networks. Topics include web security (web security model, web application security, session management and user authentication, HTTPS, etc.), network security (security issues in Internet protocols, network defense tools, DoS attacks, etc.) and mobile security (mobile platform security models, mobile threats and malware, etc.) **PREREQUISITE:** COMP 3825 or permission of instructor.

# **COMP 4430 - Digital Forensics**

**Credit Hours:** 3 **Description:** Acquisition and investigation of evidence from all devices capable of storing digital data related to the prosecution of cybercrime and fraud. Course introduces the process of forensic investigation, chain of custody, forensic analysis, court proceedings and the legal justice system. It includes an examination of digital storage and network traffic from personal computers, enterprise systems, embedded devices, and mobiles. Laboratory student exercises will use the tools and techniques of digital forensics investigators. **PREREQUISITE:** COMP 3825 and COMP 4270 or permission of instructor.

# **COMP 4432 - Secure Coding and Testing**

**Credit Hours:** 3 **Description:** Covers secure programming practices necessary to develop applications against attacks and exploits. Topics covered include fundamental concepts of secure software development, defensive programming techniques, secure design and testing, and secure development methodologies. Penetration Testing Concepts: Server-side Attacks, Client-side Attacks, Web Application Testing-Fuzz Testing, File Inclusion Vulnerabilities. **PREREQUISITE:** COMP 4410 and COMP 4081 or permission of instructor.

# **COMP 4601 - Models of Computation**

**Credit Hours:** (3) **Description:** Computer models as basis for the understanding and analysis of programming, computation and complexity; machine models (finite-state, stack and Turing machines); linguistic models (grammars, lambda calculus, predicate calculi); biologically-inspired models (e.g. neural nets or genetic algorithms);

unsolvability, universality, decidability, feasibility. (F, Sp) **PREREQUISITE:** COMP 4030, or permission of instructor.

# **COMP 4720 - Intro Artificial Intelligence**

**Credit Hours:** (3) **Description:** Fundamentals of programming in LISP; central ideas of artificial intelligence, including heuristic search, problem solving slot-and-filler structures; knowledge representation. (F) **PREREQUISITE:** COMP 2150 or permission of instructor. *Cross listing:* (Same as EECE 4720)

# **COMP 4730 - Expert Systems**

**Credit Hours:** (3) **Description:** Fundamentals of programming PROLOG, central ideas of expert system development, including knowledge representation, control structures, tools, knowledge acquisition, and knowledge engineering. (Sp) **PREREQUISITE:** COMP 2700 and COMP 4030, or permission of instructor. *Cross listing:* (Same as EECE 4730)

# **COMP 4731 - Data Visualization**

**Credit Hours:** (3) **Description:** Introduction to the terminology, methodology, and applications of data visualization. Methods for visualizing data from a variety of engineering and scientific fields including both static and time varying data and methods for generating both surface and volume visualizations. (F) **PREREQUISITE:** EECE 3221 or COMP 2150, or permission of instructor. *Cross listing:* (Same as EECE 4731)

# COMP 4741 - Intro to Neurocomputing

**Credit Hours:** (3) **Description:** Topics include connectionist datadriven AI; Learning algorithms; Least-mean squares; Supervised learning algorithms (perceptrons. backpropagation and its variants, recurrent neural nets); Unsupervised methods (Hebbian, competitive and reinforcement learning); Deep Learning; Computing platforms for neural nets; case studies. **PREREQUISITE:** COMP 2150 and MATH 3242, or permission of instructor. *Cross listing:* 6741

# **COMP 4745 - Intro to Machine Learning**

**Credit Hours:** (3) **Description:** Overview of machine learning. Hypotheses spaces, concept learning, supervised, unsupervised and reinforcement learning; classification and clustering; Bayesian methods; active learning. **PREREQUISITE:** COMP 2150, or permission of instructor.

# COMP 4882 - Capstone Software Proj

**Credit Hours:** (3) **Description:** Development of significant team project; continuation of COMP 4081; software project management; risk assessment. software requirements and specifications; software design; software validation; professional and ethical responsibilities. (Sp) **PREREQUISITE:** COMP 3115, COMP 4030, and COMP 4081, or permission of instructor.

### **COMP 4901 - Ind Study Computer Science**

**Credit Hours:** (1-3) **Description:** Directed individual study of selected areas of computer science. Repeatable May be repeated by permission for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# **COMP 4911 - Internship Computer Science**

**Credit Hours:** (1-6) **Description:** Practical experience in computer science. Students placed for some time with governmental or private organizations. Project must be approved and supervised by department faculty. Academic credit granted upon certification of the cooperating agency and acceptance by supervising faculty of student's written report. Repeatable May be repeated for up to a total of 6 hours credit. **PREREQUISITE:** permission of supervising faculty member. (S/U)

#### **COMP 4980 - Senior Thesis**

**Credit Hours:** (3) **Description:** Research conducted under the supervision of faculty member and with permission of Department of Computer Science Undergraduate Curriculum Committee.

# COMP 4990-4999 - Special Topics in Computer Science

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings. **PREREQUISITE:** permission of instructor.

#### **COUN 1661 - Career Development**

**Credit Hours:** (3) **Description:** Relationship of interests, aptitudes and careers. Includes exploration of work settings and activities to support individual career planning. Students expected to investigate work settings, relate this investigation to academic programs, and utilize this information in individual career development.

# **COUN 4002 - Independent Study**

**Credit Hours:** (1-3) **Description:** Opportunity for self directed study and/or research under the supervision of faculty member. Repeatable May be repeated for a maximum of 6 semester hours credit. **PREREQUISITE:** consent of faculty member. (S/U).

# COUN 4010-4029 - Special Topics in Counseling and Personnel Services

**Credit Hours:** (3) **Description:** Topics varied and in the online class listings.

#### **COUN 4611 - Intro to Counseling**

**Credit Hours:** (3) **Description:** Exploration of history, principles and administration of counseling services in community agencies, schools,

business and industry; survey of applicable counseling services, skills and techniques.

#### **COUN 4621 - Human Interactions**

**Credit Hours:** (3) **Description:** Human relations exercises and other personal experiences related to effective learning climates. Includes communication skills for working in groups, one-to-one relationships, and identification and referral of persons to appropriate resources.

# COUN 4781 - Strategy/Crisis Intervention

**Credit Hours:** (3) **Description:** Process of crisis intervention; study and practice in understanding crisis induced dysfunctional behavior, recognizing crisis situations, and crisis counseling procedures.

#### **COUN 4783 - Alcohol/Drug Abuse Services**

**Credit Hours:** (3) **Description:** Survey of human services for treating alcoholics and substance abusers. Overview of treatment strategies and philosophies.

### COUN 4901 - Princ/Tech/Rehab Counseling

**Credit Hours:** (3) **Description:** Overview of broad field of rehabilitation, including philosophical, social, psychological, and legal basis of rehabilitation, professional practice, counselor's role and function in the rehabilitation process.

#### COUN 4913 - Medical/Psyc Aspects/Rehab

**Credit Hours:** (3) **Description:** Orientation to medical aspects of rehabilitation; basic medical terminology, bodily systems, and DSM diagnosis; theories, application, and research in psychological adjustment of individuals with disabilities; understanding of impact of external/environmental conditions on lives of individuals with disabilities.

# COUN 4921 - Vocational Dev/Occupation Info

**Credit Hours:** (3) **Description:** Collection, evaluation, and use of occupational, educational, and related information in rehabilitation; familiarity with development of job descriptions and vocational surveys; study of labor market trends and theories of occupational choice.

#### **CRMM 4140 - Publication Design**

**Credit Hours:** (3) **Former:** JOUR 4140 **Description:** Advanced skills and techniques for design of printed media, including magazine and newspaper design; emphasis on story and page design, graphics, headlines and other display typography; approaches to print design presentation on digital platforms. Fee \$35 per credit hour **PREREQUISITE:** JRSM 3900. *Cross listing:* ART 4140

# **CRMM 4220 - Print Communication Design**

**Credit Hours:** (3) **Former:** JOUR 4220 **Description:** Practical problems in areas of publication, information, corporate and promotional design. **PREREQUISITE:** <u>JRSM 3900</u> or Permission of Instructor. *Cross listing:* (Same as ART 4220)

# CRMM 4500 - Web Publish I: html/CSS

**Credit Hours:** (3) **Former:** JOUR 4500 **Description:** Introduction of web design software of Dreamweaver and Sublime Text; development of website projects; incorporation of target audience analysis and web usability; presentation of website projects from servers. Fee \$35 per credit hour **PREREQUISITE:** JRSM 3900. *Cross listing:* ART 4500

# **CRMM 4526 - Advanced Photojournalism**

**Credit Hours:** (3) **Former:** JOUR 4526 **Description:** Advanced skills and photojournalism techniques for still photography and video; emphasis on action, sports, fashion, food, and portraits. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. *Cross listing:* ART 4526

# CRMM 4550 - Web Publish II: html/CSS

**Credit Hours:** (3) **Former:** JOUR 4550 **Description:** Creation and development of website projects; systematic training in writing html codes; focused learning of cascading style sheet (CSS); final production of a multimedia project. Fee \$35 per credit hour **PREREQUISITE:** CRMM 4500 *Cross listing:* ART 4550

#### **CRMM 4560 - Interactive Media Design**

**Credit Hours:** (3) **Former:** JOUR 4560 **Description:** Creation and development of interactive news stories for web using ActionScript; integrating writing and reporting, designing and presenting audio, video, slideshows elements in production of a multimedia story. Fee \$35 per credit hour **PREREQUISITE:** CRMM 4500 *Cross listing:* ART 4560

#### **CRMM 4900 - Creative Media Lab**

**Credit Hours:** (3) **Former:** Advanced Visual Media JOUR 4900 **Description:** Planning, development, design and execution of a multimedia project for print and digital display application, including data visualization, illustration, branding, video and photography. Fee \$35 per credit hour **PREREQUISITE:** Student must have earned 75 credit hours plus ADVR 3324. Either ADVR 3310 or JOUR 3526.

# **CRMM 4920 - Information Design**

**Credit Hours:** (3) **Former:** JOUR 4920 **Description:** Visual presentation of quantitative and spatial information. Examines the planning, design, and preparation of statistical graphs, charts, timelines, diagrams, and maps. Fee \$35 per credit hour **PREREQUISITE:** JRSM 3900. *Cross listing:* ART 4920

# CJA 3230 - Police Org/Admin

**Credit Hours:** (3) **Description:** This course provides the foundation for understanding the American law enforcement system by introducing essential elements of American law enforcement organization and practices. The main focus of the course is to examine the development of early policing and modern law enforcement systems; recruitment and training process; the structure and function of the police; legal issues that affect policing; and current issues and problems in the field of law enforcement.

# CJUS 1100 - Intro/Criminal Justice \*\*

**Credit Hours:** (3) **Former:** (TBR: CRMJ 1010) **Description:** Introduction to American criminal justice system in its three dimensions: Police, courts, and corrections, tracing its development from ancient and early English beginnings to present time.

High Impact Practice Code: Study Abroad

# CJUS 2110 - Comparative Justice System

**Credit Hours:** (3) **Description:** Overview of justice systems of various countries, focusing primarily on substantive and philosophical relationships between the subsystems and the society they serve.

# CJUS 2120 - Contemporary Issues CJUS

**Credit Hours:** (3) **Description:** Overview of current problems facing the criminal justice system; causation, potential consequences, potential solutions of crime problems.

# CJUS 2140 - Crime/Public Policy/CJ System

**Credit Hours:** (3) **Description:** Social construction, social causes, and explanations for criminal behavior. Evaluation and assessment of the major explanations of criminal behavior. Crime control and crime prevention strategies as they relate to theory, policy, and practice. Key criminological concepts, measurement of crime and delinquency, victimization, public opinion, and crime control strategies and policies. **PREREQUISITE:** CJUS 1100.

# CJUS 2226 - Introduction to Police \*\*

**Credit Hours:** (3) **Description:** Introduction to law enforcement, emphasizing the functions, operations, and practical realities of crime control in American society; career opportunities within criminal justice. **PREREQUISITE:** CJUS 1100.

# CJUS 2326 - Introduction to Courts

**Credit Hours:** (3) **Description:** Introduction to American courts, emphasizing the functions, operations, and practical realities of crime control in American society; career opportunities within criminal justice. **PREREQUISITE:** CJUS 1100.

# CJUS 2426 - Intro/Corrections in America \*\*

**Credit Hours:** (3) **Description:** Introduction to corrections, emphasizing the functions, operations, and practical realities of crime control in American society; career opportunities with criminal justice. **PREREQUISITE:** CJUS 1100.

# CJUS 3129 - Statistical Methods/CJUS

**Credit Hours:** (4) **Description:** Statistical methods commonly utilized in criminal justice research; emphasis on descriptive and inferential statistics, measures of significance, and interpretation of results; introduction to statistics software. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540, and MATH 1710, MATH 1830 or MATH 1910.

# CJUS 3130 - Research Methods CJUS \*\*

**Credit Hours:** (3) **Description:** Techniques commonly utilized in criminal justice research, emphasis on research design, methods of data collection, measurement of variables, analytical strategies for describing and making decisions using data, and threats to validity and reliability. **PREREQUISITE:** CJUS 1100 and either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 3226 - Police in America \*\*

**Credit Hours:** (3) **Description:** Comparative analysis of problems, procedures, organization, and functions of effective police organization; examination of advanced police strategies and evaluation of their effectiveness. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130 and CJUS 3540.

# CJUS 3326 - Courts in America

**Credit Hours:** (3) **Description:** Exploration and analysis of structure, process, personnel, policy, and legal theory in the American judicial system; examination of specialized and innovative courts and evaluation of their effectiveness. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130 and CJUS 3540.

# CJUS 3426 - Corrections in America \*\*

**Credit Hours:** (3) **Description:** Concepts of organizational behavior applied to probation, parole, community-based corrections, prisons, and other detention facilities, with emphasis on their history and practice; examination of specialized programs and evaluation of their effectiveness. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130 and CJUS 3540.

# CJUS 3510 - Law and Society

**Credit Hours:** (3) **Description:** Law as system of control and as mechanism for resolution of conflict; relationship of law to political, economic and social systems critically analyzed and development of legal profession studied.

**Credit Hours:** (3) **Description:** General application of U.S. constitution principles to investigative and prosecutorial process of the criminal justice system; emphasis on requirements of the 4th, 5th, 6th, 8th, and 14th Amendments as they relate to arrest, search, and seizure, interrogation and identification procedures, trial and appellate proceedings.

# CJUS 3540 - Criminology

**Credit Hours:** (3) **Description:** Examination and explanation of crime including sociological, economic, psychological, and biological theories of crime causation; theories examined in light of criminal justice data. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 3542 - Crime and Criminal Behavior

**Credit Hours:** (3) **Description:** Classification of crime and typical elements involved in each type of crime, classification of criminal offenders and salient career variables associated with each type of offender relative to background, crime, and career prognosis. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4010-4019 - Special Topics in Criminal Justice

**Credit Hours:** (1-6) **Description:** Topics are varied and in online class listings.

# CJUS 4100 - Ind Dir Studies

**Credit Hours:** (1-6) **Description:** Individual directed reading and research in special areas of interest in field of criminal justice. NOTE: Course may be repeated for a maximum of 6 semester hours credit. **PREREQUISITE:** permission of department chair.

# CJUS 4110 - Senior Capstone in CJUS

**Credit Hours:** (3) **Description:** Selected special issues integrating theory and empirical research with the evolving field of criminal justice practice, programs, and policy. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130 and CJUS 3540, and senior standing in CJUS, or permission of department chair.

# CJUS 4125 - Crime and the Media

**Credit Hours:** (3) **Description:** Crime and the Media will examine the attributes, structure, history and types of criminal organizations and how they are depicted in movies, television and the print media. *Cross listing:* N/A

# CJUS 4126 - CJUS Admin and Mgmt

**Credit Hours:** (3) **Description:** Management philosophies for administration of criminal justice agencies; focus on organizational behavior, theories of management, planning and budgeting, administrative legal issues, and administrative problems unique to the criminal justice system. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4130 - Ethical Dilemmas in Criminology and Criminal Justice

**Credit Hours:** (3) **Description:** Legal, moral, and social implications of ethical dilemmas in criminal justice, including police use of deadly force, police discretion, victimless crimes, surveillance, enforcement of unpopular laws, use of informers, plea bargaining, judicial discretion, and capital punishment; subcultural norms and dilemmas they present to criminal justice practitioners. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4150 - Internship Criminal Justice

**Credit Hours:** (1-3) **Description:** Experience in actual criminal justice setting; both department and agency supervise and direct student program. Repeatable May be repeated for maximum of 6 hours. **PREREQUISITE:** permission of department chair, permit required. (S/U)

# CJUS 4152 - Drug Misuse and Abuse

**Credit Hours:** (3) **Former:** CJUS 3152 **Description:** Cultural and medical aspects of use of alcohol and various other drugs; consideration of roles of law enforcement and corrections in these areas.

# CJUS 4160 - Forensic Sciences \*\*

**Credit Hours:** (3) **Description:** Forensic specialties in terms of their history, scientific rationale upon which each is based, and problems that may compromise accuracy or validity; introduction to field techniques and analysis of evidence. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540.

# CJUS 4170 - Prevention/Deterrence Crime

**Credit Hours:** (3) **Description:** Theoretical and practical strategies for crime prevention and deterrence. Social, environmental, and mechanical developments; police, courts, and correctional elements of criminal justice system analyzed in terms of current effectiveness and future potential for crime suppression. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540.

# CJUS 4180 - Corporate/White Collar Crime \*\*

**Credit Hours:** (3) **Description:** Organizational and occupational crime compared to other types of criminality; emphasis on causes, frequency,

1196 control, and social impact. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4190 - Terrorism Soc/Legl Prsp \*\*

**Credit Hours:** (3) **Description:** Theoretical and ideological aspects of practice of and response to international and domestic terrorism; terrorism as crime from political, social. economic, historical, and legal perspectives. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4233 - Organized Crime

**Credit Hours:** (3) **Description:** Nature, structure, characteristics, and investigation of syndicated crime; its impact on social and economic conditions in this country. **PREREQUISITE:** .CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4460 - Race, Ethnicity and Justice in America

**Credit Hours:** (3) **Description:** Race, ethnicity, and justice in the American system of criminal justice; examining how practices of criminal justice reflect societal organization, conflict, and social change.

# CJUS 4520 - Criminal Law

**Credit Hours:** (3) **Description:** Substance of the crime, including common-law sources and basic principles, types of offenses, responsibility, justification and excuse, and related areas. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540.

# CJUS 4530 - Criminal Procedure

**Credit Hours:** (3) **Description:** Rules of evidence and matters of proof affecting criminal investigation in investigatory and prosecutive stages of criminal justice; socio-legal aspect of basic rules of evidence, including hearsay rules, impeachment, materiality and relevancy, privilege, eyewitness identification. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540.

# CJUS 4531 - Constitutional Law

**Credit Hours:** (3) **Description:** Issues in constitutional rights related to criminal defendants; exclusionary rule; application of 1st Amendment to criminal law; due process, equal protection; examination of civil and criminal remedies for protecting and vindicating constitutional rights. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3130, and CJUS 3540.

# CJUS 4533 - Juvenile Delinq Theory/Process

**Credit Hours:** (3) **Description:** Theories of juvenile delinquency, gang activities, and status offenses; history, organization programs and procedures of agencies charged with control and prevention of juvenile delinquency including police, juvenile units, juvenile court, and juvenile correctional agencies. **PREREQUISITE:** CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426, and CJUS 3540.

### CJUS 4535 - Capital Punishment/America

**Credit Hours:** (3) **Description:** Social science research on death penalty in United States; legal history of death penalty; structure of modern capital trials and appeals; wrongful death convictions; racial disparities; jury decisionmaking; life histories of capital defendants; deterrence, brutalization, incapacitation; human costs of murder and execution. **PREREQUISITE:** .CJUS 1100, either CJUS 2226 or CJUS 2326 or CJUS 2426.

# CJUS 4542 - Victimology \*\*

**Credit Hours:** (3) **Description:** Analysis of victim's role in criminal event; victim interaction with offender, criminal justice system, and others involved in event; evidenced by current and historical research findings. **PREREQUISITE:** senior standing or permission of instructor.

# CJUS 4560 - Criminology of Violence and Culture

**Credit Hours:** (3) **Description:** Analysis on the major ideas on the nature of violence; theoretical paradigms for examining the nexus between violence and society. Understanding social factors which shape violence and how the context of violent actions contribute to understanding. Varying types of violence will be highlighted as to understand intent and cultural relevance.

# CJUS 4565 - Intimate Partner Violence and Victimization

**Credit Hours:** (3) **Description:** Covers the types of offenders, victims, and victimizations that can occur in intimate partner violence. Analyzes specific policy recommendations within the realm of policing, courts, and corrections necessary to manage and address intimate partner violence.

# CJUS 4570 - Gender, Crime, and Justice in America

**Credit Hours:** (3) **Description:** Gender in the American system of criminal justice; examining how practices of criminal justice reflect societal organization, conflict, and social change. **[G]** 

# CJUS 4999 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research project conducted under direction of faculty supervisor. Open only to Honors students in Criminology and Criminal Justice. **PREREQUISITE:** permission of instructor.

**Credit Hours:** (3) **Description:** Introduction to the field of Dance Science. Career opportunities within the field will be investigated. The course will provide a basic understanding of dance science and nutrition and its application to dance technique and training, anatomically sound dance pedagogy, and safe and appropriate uses of the body in choreography.

### **DANC 1151 - Introduction to Dance**

**Credit Hours:** (3) **Description:** Comprehensive study of dance as an expressive art form, a symbolic language, and an integral aspect of world cultures; emphasis on developing both aesthetic response and critical skills through an analysis of major dance forms, styles, and genres. **[G]** 

High Impact Practice Code: Learning Community

# DANC 1821 - Beginning Contemporary Dance

**Credit Hours:** (3) **Description:** Introduction to modern dance techniques; emphasis on exploration of fundamentals of dance. For student with little or no previous experience in modern dance. Repeatable May be repeated for a maximum of 6 hours credit with permission of instructor.

# DANC 1825 - Beginning Ballet

**Credit Hours:** (3) **Description:** Introduction to classical ballet technique; emphasis on barre and center floor work. For student with little or no previous experience in ballet. Repeatable May be repeated for a maximum of 6 credit hours with permission of instructor.

# DANC 1827 - Beginning Jazz

**Credit Hours:** (3) **Description:** History and culture of traditional and contemporary jazz dance techniques. For student with little or no previous experience in jazz dance. Repeatable May be repeated for a maximum of 6 credit hours with permission of instructor.

# DANC 1831 - Tap Dance I

**Credit Hours:** (3) **Description:** Introduction to basics of rhythm tap, including technique, traditional movement vocabulary, rhythmic sensibility, history and development of individual style. Repeatable May be repeated for a maximum of 4 hours credit.

# **DANC 2101 - Dance Improvisation**

**Credit Hours:** (3) **Description:** Elements of space, time and force; their interrelationships and their specific applications to movement sequences; experiences in spontaneous development of dance phrases. Repeatable May be repeated for a maximum of 6 hours credit. (Offered alternate years).

#### DANC 2821 - Intermediate Contemporary Dance

**Credit Hours:** (3) **Description:** Intermediate contemporary dance techniques. NOTE: May be repeated for a maximum of 6 credit hours. **PREREQUISITE:** DANC 1821, or permission of instructor.

#### **DANC 2825 - Intermediate Ballet**

**Credit Hours:** (3) **Former:** Ballet II **Description:** Intermediate ballet techniques. Repeatable May be repeated for a maximum of 18 hours credit hours. **PREREQUISITE:** Two semesters of DANC 1825 or permission of instructor.

#### DANC 2827 - Intermediate Jazz

**Credit Hours:** (3) **Description:** Intermediate jazz dance techniques. NOTE: May be repeated for a maximum of 12 hours credit. **PREREQUISITE:** DANC 1821, DANC 1827, DANC 1825, or permission of instructor.

#### DANC 3101 - History of Dance

**Credit Hours:** (3) **Description:** Basic features of and uses for dance and expressive movement from early cultures to present. (Offered alternate years). (W)

#### **DANC 3201 - Dance Movement Analysis**

**Credit Hours:** (3) **Description:** Theory and methods of analyzing and describing dance movement. Varied semester topics: dance notation, Laban movement analysis, Bartenieff fundamentals, rhythmic analysis, kinetic awareness and body alignment techniques. Repeatable May be repeated for a maximum of 6 hours credit. (Offered alternate years).

#### DANC 3825 - Advanced Ballet

**Credit Hours:** (3) **Description:** Advanced ballet technique. Repeatable May be repeated for a maximum of 14 hours credit. **PREREQUISITE:** permission of instructor.

#### DANC 3826 - Musical Theatre Dance I

**Credit Hours:** (3) **Description:** Study of musical theatre dance performance styles through preparation and performance of selection from standard repertory; development of technical mastery of musical theatre dance vocabulary, character driven dance performance. Repeatable May be repeated for a maximum of 4 hours credit. **PREREQUISITE:** permission of instructor.

#### DANC 3827 - Musical Theatre Dance II

**Credit Hours:** (3) **Description:** Advanced study of music theatre dance performance styles through preparation and performance of selections from standard repertory; development of technical mastery of musical theatre dance vocabulary and character driven dance

performance. Repeatable May be repeated for a maximum of 4 hours credit. **PREREQUISITE:** permission of instructor.

#### **DANC 3829 - Advanced Contemporary Dance**

**Credit Hours:** (3) **Description:** Advanced contemporary dance technique. Focus on artistic concerns appropriate to advanced level. NOTE: May be repeated for a maximum of 18 credit hours. **PREREQUISITE:** Two semesters of DANC 1821 or two semesters of DANC 2821 or permission of instructor.

#### DANC 4000 - Strength / Conditioning for Dancers

**Credit Hours:** (3) **Description:** The course is designed for any dancer and mover to improve on his/her strength, flexibility, endurance, overall health, and performance level. This course emphasizes proper body awareness and realizes that dancers are athletes.

#### DANC 4001-4029 - Special Topics in Dance

**Credit Hours:** (1-3) **Description:** Topics are varied and announced in the online course listings. Repeatable May be repeated for a maximum of 9 hours credit when topic varies.

#### **DANC 4101 - Dance Repertory**

**Credit Hours:** (3) **Description:** Exploration of stylistic, technical, and expressive elements in rehearsal and performance; notated works, faculty and guest artist choreography. Repeatable May be repeated for a maximum of 9 hours credit. (Offered alternate years). **PREREQUISITE:** permission of instructor.

#### DANC 4201 - Dance Composition I

**Credit Hours:** (3) **Description:** Investigation of movement sources and development of elements of choreographic craft. Emphasis on solo and duet work. NOTE: May be repeated for a maximum of 6 hours credit. (Offered alternate years).

#### DANC 4202 - Dance Composition II

**Credit Hours:** (3) **Description:** Continued investigation of movement sources and choreographic craft from concept development through rehearsal and performance; emphasis on group forms and working with music. NOTE: May be repeated for a maximum of 6 hours credit. (Offered alternate years). **PREREQUISITE:** DANC 4201, or permission of instructor.

#### **DANC 4301 - Directed Studies Dance**

**Credit Hours:** (1-3) **Description:** Individual study, research or practicum. Repeatable May be repeated for a maximum of 12 hours credit. **PREREQUISITE:** permission of instructor.

# DANC 4402 - Dance Ed/Diverse Settng

**Credit Hours:** (3) **Description:** Theory, methods and materials for teaching modern and creative dance in schools, dance studios, arts programs, and community settings; current research in aesthetic education and curriculum development. PREREQUISITE: DANC 4404 or permission of instructor.

# **DANC 4404 - Dance Teaching Methods**

**Credit Hours:** (3) **Description:** Analysis of principles, methods, philosophy, materials, practice of teaching dance in educational settings; emphasis on preparing student to teach dance in public schools.

# ECED 2030 - Infant/Toddler Care

Credit Hours: (3)

**ECED 2130 - Clinical Practicum I** 

Credit Hours: (2)

ECED 3130 - Clinical Practicum I

**Credit Hours:** (3)

# ECED 3555 - Obsrv/Assmnt Infant/Erly Ch

**Credit Hours:** (3) **Description:** Developmental perspective on measurement and evaluation in early childhood years. Considers standardized tests, observations, checklists and rating scales, and tests designed by teachers; their advantages and disadvantages for use with young children; and professional ethical issues pertaining to evaluating young children. Field experience required. **PREREQUISITE:** PREREQUISITE: Junior Status.

# ECED 4005 - Fam/Sch Collaboration/ECED

**Credit Hours:** (3) **Description:** Emphasizes family systems theory as a guide to understanding, appreciating, and supporting diverse families; strategies for collaborating with families. Field experiences required. PREREQUISTE: ECED 3555, ECED 4510 and admisison to TEP. COREQUISITE: ECED 4500, 4515 and 4540.

# ECED 4500 - Emergent Literacy/Lang Dev

**Credit Hours:** (3) **Description:** Cognitive view in developmental perspective of language development and literacy processes from birth to age five; materials and methods of teaching and assessing language development and emergent literacy from a sociocultural perspective. Field experience required. **PREREQUISITE:** ECED 3555, ECED 4510, Junior Status.

Credit Hours: (3) Description: Early childhood profession, its

# ECED 4510 - Early Chid Prgms/Pr

issues, trends and public policies affecting children, families, programs for young children and early childhood profession; exploring early childhood teacher roles and responsibilities through observations in multi-cultural settings. Field experience required. **PREREQUISITE: PREREQUISITE:** Junior Status.

# ECED 4515 - Teach/Lrng Erly Chld Ed

**Credit Hours:** (3) **Description:** Developmentally appropriate teaching and learning methods with emphasis on the teacher's role as facilitator; fostering development and learning through play; creating appropriate, psychologically safe and healthy learning environments; fostering individual and group interactions. Field experience required. **PREREQUISITE:** ECED 3555, ECED 4510 and Junior Status.

# ECED 4520 - Plan/Facilitn Social Lrng/Dev

**Credit Hours:** (3) **Description:** Planning, implementing, and evaluating programs to facilitate young children's social learning from birth through age 8; addresses socialization, social science skills, knowledge, and dispositions in context of integrating content instruction and learning. Field experience required. **PREREQUISITE:** ECED 3555, ECED 4005, ECED 4510, ECED 4540 and admission to TEP. **COREQUISITE:** ECED 4005, ECED 4530, ICL 4914, and LITL 4240.

### ECED 4525 - Practicum Early Chld Tch/Lrn

**Credit Hours:** (1) **Description:** Planning, implementing, evaluating early childhood methods and materials in K-3 classes. **PREREQUISITE:** PREREQUISITE: admission to TEP.

# ECED 4530 - Plan/Facltn Math/Science Lrng

**Credit Hours:** (3) **Description:** Provides knowledge, skills, and dispositions necessary to plan for and facilitate development and learning of physical, logico-mathematical, social knowledge of math and science for children from birth through nine years. Field experience required. **PREREQUISITE:** ECED 3555, ECED 4005, ECED 4510, ECED 4515, ECED 4540 and admission to TEP. **COREQUISITE:** ECED 4005, ECED 4520, ICL 4914, LITL 4240.

# ECED 4540 - PIn/Fclt Infant/Toddler Dev

**Credit Hours:** (3) **Description:** Models, principles, curriculum and practices of developmentally appropriate infant/toddler caregiving; emphasis on teacher's knowledge of child development, skills and dispositions necessary to foster infant and toddler development in group care settings. Field experience required. **PREREQUISITE:** PREREQUISITE: junior status. **COREQUISITE:** COREQUISITE: ECED 4500, 4005, 4515.

# **ESCI 1010 - Weather and Climate**

**Credit Hours:** (4) **Former:** (GEOG 1010) **Description:** Atmospheric processes and geographic distribution of radiation, moisture, pressure, and circulation interacting to create weather systems and storms;

multiple historical, philosophical, and social foundations; current and circulation interacting to create The online catalog can be accessed at: http://catalog.memphis.edu/index.php oceanic influences, earth-sun relationships, global climate patterns; human interaction with atmosphere. Laboratory exercises, observations, and experiments designed to apply scientific methods. Fee \$25.00 lab fee Three hours lecture, three hours laboratory per week **[G]** 

#### ESCI 1020 - Landforms \*\*

**Credit Hours:** (4) **Former:** (GEOG 1020) **Description:** Agents and processes of landform development and geographic relationships of landscapes including volcanic, fluvial, glacial, and coastal environments; soil development and vegetation associations; environmental hazards to humans; maps and aerial photo interpretation as sources of environmental information. Laboratory exercises, observations, and experiments designed to apply scientific methods subjects. Fee \$25.00 lab fee Three hours lecture, two hours laboratory per week. **[G]** 

# ESCI 1040 - Physical Geology

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Introduction to processes that form the rocks in the earth's crust; the earth's internal forces that make mountains and volcanoes; special emphasis on topics that impact the Mid-South, such as earthquakes. Fee \$25.00 lab fee Three lecture hours, two laboratory hours per week. **[G]** 

# ESCI 1050 - The Earth Through Time

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Overview of history of earth and its life as interpreted from rock and fossil record; origins of continents, mountain ranges, ocean basins and National Parks. Fee \$25.00 lab fee Three lecture hours, two laboratory hours per week. **[G]** 

# ESCI 1100 - Biol Anth & Prehistory

**Credit Hours:** (3) **Description:** Evolutionary basis of human origins and contemporary biocultural variation; fossil record of primate and hominid evolution; beginnings of human society; discovery of agriculture and emergence of complex societies; controversies in the search for human origins. *Cross listing:* (Same as ANTH 1100)

#### ESCI 1103 - The Human Planet

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Applications of physical geology to understanding, evaluating and solving problems encountered in the environment by past human populations; study in management, utilization and preservation of archaeological resources. Fee \$25.00 lab fee Three lecture hours, two laboratory hours per week. **[G]** 

# ESCI 1301 - Survey of World Regions

**Credit Hours:** (3) **Former:** (GEOG) (TBR: GEOG 2010) **Description:** Survey of economic, cultural and physical traits characteristic of developing and industrialized nations. **[G]** 

# ESCI 1401 - Intro/Cultural Geography

**Credit Hours:** (3) **Former:** (GEOG) (TBR: GEOG 1030) **Description:** Geographical aspects of human behavior; distributional patterns and interactions of such cultural characteristics as language, religion, politics, and economics. **[G]** 

### ESCI 2300 - Great Discoveries in Archaelogy

**Credit Hours:** 3 **Description:** Great discoveries of archaeology that underlie our understandings of ancient societies and social institutions are explored. Overviews of major archaeological investigations, the archaeologists, and contemporary excavation practices; beginnings of society; discovery of agriculture; and the emergence of complex societies provide the basis to emphasize basics of the scientific methods of archaeology and the obligation to learn from prehistory. *Cross listing:* ANTH 2300

# ESCI 2301 - Fundamentals of Archaeology

**Credit Hours:** (4) **Description:** Hands-on experience in archaeological methods; survey of past civilizations; critical evaluation of how modern archaeological methods and theories are applied. Fee Course Fee: \$25. **PREREQUISITE:** ANTH 1100, recommended. *Cross listing:* (Same as ANTH 2301)

### **ESCI 3100 - Seminar in Emergency Management**

**Credit Hours:** (3) **Description:** Synthesizing and integrating the various elements of emergency management. *Cross listing:* (Same as EMGT 3100, UNIV 3100 and PADM 3100)

#### ESCI 3131 - Severe Weather

**Credit Hours:** (3) **Description:** Descriptive account of the physical processes important in the formation of blizzards, ice storms, thunderstorms, tornadoes, hurricanes, floods, and heat waves. **PREREQUISITE:** ESCI 1010

# ESCI 3200 - People/Culture World

**Credit Hours:** (3) **Description:** Major ethnographic areas and selected cultures of world.

#### ESCI 3211 - Invertebrate Paleontology

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Fossil invertebrate animals and their importance in interpretation of ancient environments, evolution, and geologic time. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1040, or permission of instructor.

# **ESCI 3221 - Principles/Conservation**

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Development of conservation ethic and wilderness concepts; survey of environmental problems, land use, and energy and resource utilization; soil erosion and crop productivity relationships.

# ESCI 3230-3239 - Special Topics in Earth Sciences

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings.

# ESCI 3311 - Mineralogy/Petrology

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Classification and identification of minerals. igneous rocks, metamorphic rocks in hand specimen; geological occurrence and use of minerals; genesis and occurrence of igneous and metamorphic rocks. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1020 or ESCI 1040, or permission of instructor.

# ESCI 3451 - Intro/Urban Planning

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Introduction to regional and urban planning emphasizing spatial relationships of physical, economic, and cultural phenomena necessary in planning process.

### **ESCI 3602 - Introduction to Geophysics**

**Credit Hours:** (3) **Description:** Physical methods used to study the earth's interior. Each method is based on a particular area of physics such as seismology, potential methods (gravity and magnetics), electricity and magnetism, radioactivity and heat. Emphasis is placed onthe the interpretive aspects of each of the methods, as well as on their relative advantages and limitations. **PREREQUISITE:** PHYS 2010.

# ESCI 3712 - Sedimentology/Stratighy

**Credit Hours:** (4) **Description:** Origin and classification of sedimentary rocks and mutual relationship of sedimentary rock bodies both geographically and through geologic time. Lecture emphasizes comparison of modern depositional systems with their ancient counterparts. Laboratory emphasizes hand specimen analysis and preparation of geologic maps. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1050 or permission of instructor.

#### ESCI 3802 - Oceanography

**Credit Hours:** (3) **Former:** (GEOL 3802) **Description:** Origin, chemistry, water circulation, shoreline and deep water characteristics of oceans; its role in evolution and history of earth; marine life and its ecology.

# ESCI 4122 - Soils and Soil Processes

**Credit Hours:** (3) **Former:** (GEOG 4122) **Description:** Processes and dynamics of soil profile development; major models of soil development examined and applied to soil genesis in Tennessee; application of soil techniques to archaeology, planning, earth sciences,

1201 and soil conservation and erosion problems; emphasis on field and laboratory techniques with field work in soil mapping and soil taxonomy. Fee Course Fee: \$25 Two lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1020 or ESCI 1040.

#### ESCI 4201 - Urbanization/Environment

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Ways man has changed natural environment by urbanization and how physical features and processes influence development and function of cities.

#### ESCI 4202 - Geomorphology

**Credit Hours:** (4) **Former:** (GEOL) **Description:** Description, origin and interpretation of landforms and their relationships to underlying structure and geologic history; processes acting on earth's surface, including active tectonics; weather; mass-wasting; climate change; and fluvial, shoreline, and glacial processes. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1020 or ESCI 1040

# ESCI 4211 - Physical Hydrology

**Credit Hours:** (4) **Description:** Movement, storage and development of groundwater; groundwater in the hydrologic cycle; aquifer characteristics and tests. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1040 and MATH 1830 or equivalent. *Cross listing:* CIVL 4211

#### ESCI 4213 - Field Methods/Hydrology

**Credit Hours:** (3) **Former:** (GEOL) **Description:** Practice of field methods in solving hydrologic problems. **PREREQUISITE:** ESCI 4211, or permission of instructor.

#### ESCI 4214 - Climatology

**Credit Hours:** (3) **Former:** (GEOG 4211) **Description:** Climatic elements and methods of data analysis; applications of climatology in agriculture, health, economics, and architecture. **PREREQUISITE:** ESCI 1010, MATH 1710, and PHYS 2010, or permission of instructor.

#### **ESCI 4215 - Physical Climatology**

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Components of earth's energy balance, emphasis on solar radiation, heat transfer, and evapotranspiration. **PREREQUISITE:** ESCI 1010 and PHYS 2010/PHYS 2011.

# ESCI 4216 - Synoptic Meteorology

**Credit Hours:** (3) **Description:** Physical processes in the atmosphere applied to analysis and interpretation of synoptic (regional) scale systems using weather maps, upper-air soundings, satellite and radar imagery, and computer model output; introduction to techniques used

in weather forecasting. **PREREQUISITE:** ESCI 1010, MATH 1710 and PHYS 2010, or permission of instructor.

#### ESCI 4231 - Water Resources

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Hydrologic processes and their application to needs of cities, industry, agriculture, and recreation.

# ESCI 4241 - Biogeog/GIS Analyses/Ecology

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Basic principles of interaction between geography, organism diversity and evolution; physical factors limiting species distribution, theories of island biogeography, geographical modes of speciation. Laboratories introduce principles of GIS, basic functions of ArcGIS, and other programs relevant to ecological studies. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** BIOL 1120 and BIOL 1121, or permission of instructor. *Cross listing:* (Same as BIOL 4241)

# **ESCI 4251 - Environmental Hazards**

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Environmental hazard and disaster experiences to investigate the nature, impact, and social responses to environmental hazards; focus is placed on relationship between nature, society, and technology in how people and places perceive, experience, and cope with environmental hazards.

# ESCI 4252 - Global Environmental Change

**Credit Hours:** (3) **Former:** (GEOP) **Description:** Characteristics of natural systems; magnitude of human alteration of environmental systems; history of natural changes in climate and landscape; impact of changes. **PREREQUISITE:** permission of instructor.

# ESCI 4261 - Plan Sustainable Cities/Region

**Credit Hours:** (3) **Description:** Multidisciplinary and multi-scaled approach to understanding the sustainability of natural and built environments in planning cities and regions; methods for measuring sustainability; emerging development concepts and practices; technology, efficiency, social equity and public health implications of sustainability; sustainable urban/regional form of the future.

# ESCI 4301 - Archaeology of the Americas

#### Credit Hours: (3) Description:

Intensive study of various prehistoric cultures of the Americas from earliest times until historic contact.

Prerequisite ANTH 1100, ANTH 1200, or permission of instructor. Repeatable can not be repeated **PREREQUISITE:** ANTH 1100, ANTH 1200, or permission of instructor. *Cross listing:* (Same as ANTH 4301).

# ESCI 4307 - Thematic Studies/China

**Credit Hours:** (3) **Description:** Geographic analysis of physical, cultural, and economic characteristics of China and neighboring regions.

1202

# ESCI 4308-4312 - Special Topics in Regional Geography

**Credit Hours:** (3) **Description:** Geographic analysis of physical, cultural, economic characteristics of a selected world geographic region, including Europe, United States, Canada, Central America, South America. Repeatable May be repeated for a maximum of 9 hours credit with a change in topic.

# ESCI 4325 - Archaeol Fld/Lab Techn

**Credit Hours:** (3) **Description:** Field excavation, specimen preparation, use of survey instruments and photography, map making, archaeological record keeping; methods and techniques in archaeological laboratory analysis; emphasis on organization and supervision of laboratory procedures. **PREREQUISITE:** permission of instructor. *Cross listing:* (Same as ANTH 4325).

# ESCI 4332 - Intro to Geochemistry

**Credit Hours:** (3) **Former:** (GEOL) **Description:** Geological and chemical processes that govern or control migration and distribution of elements and atomic species of earth in space and time. Three lecture hours per week. **PREREQUISITE:** ESCI 3311, or permission of instructor.

#### ESCI 4335 - Analysis of Stone Artifacts

**Credit Hours:** 3 **Description:** Much of the prehistoric cultural record is pieced together through the analysis of stone artifacts. The class outlines the basics of stone "lithics" artifact anlysis through an in-depth study of current techniques, instrumentation, and theory. Lecture is augmented by class discussion and hands-on experimentation "flintknapping." *Cross listing:* ANTH 4335

# ESCI 4341 - Aqueous Geochemistry

**Credit Hours:** (3) **Former:** (GEOL) **Description:** Physical chemistry of aqueous solutions as applied to geochemical processes on earth's surface. **PREREQUISITE:** CHEM 1120.

# ESCI 4342-4346 - Special Topics in Geology

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings.

#### ESCI 4350 - Archaeology of Collapse

**Credit Hours:** (3) **Description:** Emphasis on archaeology of regional politics and archaic states throughout the world. Overview of social and political collapse of complex societies. *Cross listing:* (Same as ANTH 4350)

#### ESCI 4352 - Archaeology/World Prehistory

**Credit Hours:** (3) **Former:** (3351) **Description:** Global survey of cultures from first humans to early civilizations. *Cross listing:* (Same as ANTH 4352)

### ESCI 4365 - Cultural Resource Mgmt

**Credit Hours:** (3) **Former:** (ANTH 4375-6375) **Description:** The majority of archaelogocial work in North America is conducted in compliance with tribal, state, and federal legislation in Cultural Resource Management (CRM). The ultimate goals of this course is to prepare students for CRM roles and responsibilities through learning the historic development, current legislation, practices and real world skills needed to conduct CRM work.

# ESCI 4370-4379 - Special Topics in Archaeology

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 9 hours credit with a change in topic.

### ESCI 4430 - Economic Geography

**Credit Hours:** (3) **Former:** (ESCI 3430) **Description:** Spatial characteristics and distribution of economic activities.

### ESCI 4431 - Urban Geography

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Geography of urban processes and forms; cultural, social, economic, and political aspects of the contemporary city.

#### **ESCI 4443 - Transportation Planning**

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Planning for various transportation modes and networks and impact they have on land use and contemporary development problems. **[G]** *Cross listing:* PLAN 4443.

#### ESCI 4502 - Computer Cartography

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Use of computer mapping programs as effective techniques for visual presentation of wide variety of data. Fee Course Fee: \$25. Two lecture hours, two laboratory hours per week

# ESCI 4511 - Remote Sensing/Environ

**Credit Hours:** (3) **Former:** (GEOG 4511) **Description:** Survey of theory and application of using color, infrared, thermal, and radar images generated from satellite and aerial photographs for geographic, geologic, environmental, and planning purposes. Fee Course Fee: \$25. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** one college-level MATH course, or permission of instructor.

#### ESCI 4512 - Structural Geology

**Credit Hours:** (4) **Former:** (Was 3512) (GEOL) **Description:** Structures of the crust; geometry of folds and faults, rock deformation, criteria for recognizing structures, solution of geometrical problems. Fee Course Fee: \$25. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1040, MATH 1910, or permission of instructor.

# ESCI 4515 - Geographic Info Science

**Credit Hours:** (3) **Description:** Theoretical and practical understanding of fundamental GIS concepts, capabilities, and applications; nature of geographic data and issues of data input, data models, database design, spatial analysis, data output using ArcGIS software. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** ESCI 1010 or ESCI 1020 or permission of instructor.

# **ESCI 4521 - Quantitative Methods**

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Introduction to quantitative methods in spatial analysis.

# ESCI 4525 - Adv Geographic Info Science

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Design and implementation of spatial analysis approaches within the context of GIS technology; development of a sound understanding of the operational basis of modern GIS technology. **PREREQUISITE:** GEOG 4515, or permission of instructor.

# ESCI 4526 - Advanced Remote Sensing

**Credit Hours:** (3) **Description:** Practical exercises and datasets to eleborate on fundamental skills introduced in ESCI 4511. Topics include advanced image enhancement techniques, hyper-spectral image analysis, change detection, and analysis of active sensor system (LiDAR). **PREREQUISITE:** ESCI 4511, or permission of instructor.

# ESCI 4531 - Field Methods/Geography

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Basic methods of geographic analysis used in classifying, analyzing and reporting field generated data including field mapping, sampling procedures, questionnaires and archival and public document research. Fee Course Fee: \$25. One and one-half lecture hours, three laboratory hours per week.

# ESCI 4535 - Modular GIS

**Credit Hours:** (3) **Description:** Implementation of modular learning content within the various GIS domains such as mapping and visualization, analytics, scripting and development, sharing GIS content, field mobility, real-time monitoring and discipline specific topics such as public safety, public health, business and geology,

etc. **PREREQUISITE:** ESCI 4515/6515 or ESCI 4525/6525 or permission of instructor. *Cross listing:* ESCI 6535

# ESCI 4541 - Geography/Field Studies

**Credit Hours:** (1-6) **Former:** (GEOG) **Description:** Faculty conducted field trip emphasizing study of geographic phenomena. Location will vary. Topics may include physical landscapes, landaus patterns, cross-cultural analysis, micro and regional economics, or other geographical processes. Credit hours based on length of time in field. Requires field journal and report to receive credit. Repeatable May be repeated for maximum of 6 hours credit with change in content. **PREREQUISITE:** permission of instructor and completion of special registration.

### ESCI 4551 - Urban Planning Studio

**Credit Hours:** (3) **Former:** (GEOG) **Description:** Application of planning process to urban problems and preparation of plans for the urban area. **PREREQUISITE:** GEOG 3451 or permission of instructor.

### ESCI 4610-4619 - Special Topics In Geography

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated a maximum of 9 hours credit with a change topic.

#### **ESCI 4621 - Investigations In GEOG**

**Credit Hours:** (1-3) **Description:** Student, under faculty supervision, studies in-depth particular geographic topic. Repeatable May be repeated for a maximum of 3 hours credit with change in content. **PREREQUISITE:** approval of instructor. (S/U/IP)

#### ESCI 4622 - Geology Field Camp

**Credit Hours:** (6) **Description:** Preparation of structural and lithologic maps in prescribed geologic areas using topographic maps and aerial photographs. Instruments used are the alidade and the Brunton compass. Offered in summer school only. **PREREQUISITE:** ESCI 3311, ESCI 4512 and ESCI 3712.

#### ESCI 4680 - Applied Archaeology/Museums

**Credit Hours:** (3) **Description:** Representations of cultural heritage in a broad array of public venues; repatriation, cultural patrimony, cultural resource management, civic engagement, rights and responsibilities of stakeholders, public involvement in museum representations, performance and education, culture and memory. *Cross listing:* (Same as ANTH 4680)

#### ESCI 4700 - Earth Science Internshp

**Credit Hours:** (1-9) **Former:** (GEOG) **Description:** Experience working with agency in which knowledge of earth science can be

1204 utilized. Repeatable May be repeated for a maximum of 9 hours credit. Credit allowed only after acceptance of report. **PREREQUISITE:** approval of instructor and department chair. (S/U)

# **ESCI 4701 - ESCI Field Excursions**

**Credit Hours:** (1-2) **Former:** (GEOL) **Description:** Conducted field trips during spring vacation. About 30 hours of field work follow 2-4 hours of lectures. Open to nonmajors. Among areas which may be included are Ouachita-Arbuckle-Wichita Mountains of Oklahoma; Ouachita, Ozark dome and adjacent mineral districts; central and southern Appalachians; Gulf Coastal Plain; Death Valley, CA; and Grand Canyon, AZ. Check online class listings for specific location. Dates, hours and credits to be arranged. Fee Course Fee: \$25. NOTE: May be repeated for a maximum of 8 hours credit. **PREREQUISITE:** permission of instructor.

### **ESCI 4722 - Investigation In ESCI**

**Credit Hours:** (1-3) **Description:** Individual or group work on topics of current interest in the broad field of earth sciences. Repeatable May be repeated for maximum of 6 hours credit. **PREREQUISITE:** permission of instructor. (S/U/IP)

### ESCI 4731 - Senior Thesis

**Credit Hours:** (1-3) **Description:** Original study on subject of significance to earth science to be carried on independently by student with faculty supervision. **PREREQUISITE:** senior standing in Earth Sciences. (S/U/IP)

#### ESCI 4801 - Seminar in Applied Geography

**Credit Hours:** (3) **Description:** Perspectives and techniques of geography applied to contemporary topics in a seminar format based on review of literature, current issues, and the written and oral presentation student work . NOTE: Registration by permit only. **PREREQUISITE:** ESCI 1010, ESCI 1020 and two additional upper division courses selected from two of the following areas: human/economic, environmental/earth, or the techniques.

#### ECON 2010 - Intro to Macroeconomics\*\*

**Credit Hours:** (3) **Former:** (2110) **Description:** Nature and functions of the national economy in a global context. Includes consumption and investment behavior, national income and product determination, fiscal and monetary policy, and international trade. **[G]** 

#### ECON 2020 - Intro to Microeconomics\*\*

**Credit Hours:** (3) **Former:** (2120) **Description:** Operation of the market economy at the individual and firm level; supply and demand analysis, consumer behavior, behavior of firms in both competitive and monopoly environments, income distribution theory, and effects of government intervention in the market economy. **[G]** 

# ECON 2900 - Experiential Learning Credit

**Credit Hours:** (1-9) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Lowerdivision credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course ELC 3900.

### ECON 3020-3029 - Special Topics in Economics

**Credit Hours:** (3) **Description:** Current economic issues and problems in the United States; emphasis on application of tools and analytical methods. **PREREQUISITE:** ECON 2010, ECON 2020

# **ECON 3210 - Labor Economics**

**Credit Hours:** (3) **Description:** Introduction to institutional aspects of American labor force and its organization wage and employment theory, economic role of collective bargaining, and basic ingredients of public policy toward labor organization. **PREREQUISITE:** ECON 2020.

### ECON 3310 - Intermediate Microeconomic Theory

**Credit Hours:** (3) **Description:** Intermediate approach to price theory; stress on market mechanism as device for resource allocation; attention to uses of basic microeconomic concepts in analysis of economic problems and in formulation of policy. **PREREQUISITE:** ECON 2020.

# ECON 3320 - Intermediate Macroeconomic Theory

**Credit Hours:** (3) **Description:** Intermediate approach to social income accounting and to functional relationships between important aggregate economic variables as well as to forecasting and social policy implications. **PREREQUISITE:** ECON (TNe) 2010.

# ECON 3610 - Money and Banking

**Credit Hours:** (3) **Description:** Monetary and banking history of leading countries with special emphasis on theory of money and banking in United States, deposit and earnings operations of individual banks, interbank and central bank relations. **PREREQUISITE:** ECON (TNe) 2010.

# **ECON 3900 - Experiential Learning Credit**

**Credit Hours:** (1-9) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Upper division credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course ELC 3900.

# ECON 4120 - Economic Forecasting

1205 **Credit Hours:** (3) **Description:** Current economic thinking on problems of recession and inflation as background to economic forecasting; methodologies of forecasting analyzed with examples of each. **PREREQUISITE:** SCMS 3711, or equivalent.

### **ECON 4210 - Public Economics**

**Credit Hours:** (3) **Description:** Government taxation and spending programs and effect on markets; production and provision of public goods; externalities, Medicare, Medicaid, Social Security; behavior in output and input markets; theory of optimal taxation. **PREREQUISITE:** ECON 2020 with a grade of "C" or better.

### ECON 4220 - Urban Economics

**Credit Hours:** (3) **Description:** Examines issues relevant to cities, including the reasons why cities exist, how economic activity is organized within cities; transportation, poverty, crime, development, public finance. **PREREQUISITE:** ECON 2020.

# ECON 4250 - Econ Poverty/Discrimination

**Credit Hours:** (3) **Description:** Measurement, causes, and consequences of poverty; various policy solutions to poverty; examination of numerous forms of discrimination and how they affect market outcomes. **PREREQUISITE:** ECON 2020.

### **ECON 4315 - Applied Macroeconomics**

**Credit Hours:** (3) **Description:** This course covers the theoretical foundations and practice of macroeconomic analytics for understanding policy making and implications for business decision making. **PREREQUISITE:** ECON 2010; ECON 2020

#### **ECON 4350 - International Econ**

**Credit Hours:** (3) **Description:** Historical approach to theory of international trade; consideration given to Classical, Neo-Classical and Modern approach to trade theory with emphasis on policy implications of the analysis. **PREREQUISITE:** ECON 2020 or equivalent.

# ECON 4351 - International Monetary Theory/Policy

**Credit Hours:** (3) **Description:** Open economy macroeconomics; examination of payments among nations, foreign exchange markets, determinants of exchange rate policies; national income and foreign exchange, internal and external balance and international factor movements. **PREREQUISITE:** ECON 2010

# **ECON 4512 - Behavioral Economics**

**Credit Hours:** (3) **Description:** Reconciling the standard economic models with key psychological observations in order to predict and understand phenomena such as loss aversion, trust, reciprocity, present

bias, procrastination and self-control. **PREREQUISITE:** ECON 2010, or permission of instructor.

# ECON 4550 - Game Theory/Strategic Analysis

**Credit Hours:** (3) **Description:** Study of strategic behavior when parties have opposed, mixed, or similar interest; sequential and simultaneous move games, pure mixed strategies, various equilibrium concepts, and repeated games. **PREREQUISITE:** ECON 2020.

# ECON 4560 - Contemporary Issues in Econ

**Credit Hours:** (3) **Description:** Topics relevant to modern economics from an interdisciplinary perspective; exploration of the role of psychology, sociology, and political science in economic theory and policy. Students will be introduced to behavioral economics, behavioral finance, bounded rationality, satisficing, and decision making under uncertainty. **PREREQUISITE:** ECON 2010 and ECON 2020.

# **ECON 4561 - Economics of Financial Crisis**

**Credit Hours:** (3) **Description:** Causes that precipitated the financial crisis of 2008 and the ensuing Great Recession; historical precedent for the crisis.

# **ECON 4740 - Health Care Economics**

**Credit Hours:** (3) **Description:** Unique nature of health care as economic good, health care market and its participants including patients, physicians, and hospitals, and financing and delivery of personal health care in United States and other countries.

# ECON 4760-4769 - Special Topics in Economics

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated with a change in topic. **PREREQUISITE:** permission of department chair.

# ECON 4810 - Quant Economics Analysis

**Credit Hours:** (3) **Description:** Introduction to application of mathematical tools in business and economics; review of matrix algebra, differential and integral calculus; optimization with and without constraints; comparative statistics.

# **ECON 4820 - Econometrics**

**Credit Hours:** (3) **Description:** Introduction to statistical procedures used to estimate and test quantitative economic theories, using microcomputer software for regression analysis. **PREREQUISITE:** SCMS 2710 or MATH 1530 or equivalent as approved by instructor.

# ECON 4910 - Independent Study in Economics

1206 investigation. Repeatable May be repeated to maximum of 3 hours credit. **PREREQUISITE:** upper division standing and approval of department chair.

### **ECON 4911 - Internship in Economics**

**Credit Hours:** (1-6) **Description:** Internship in business organization to gain on-the-job experience. Project to be approved and supervised by departmental faculty. Credit allowed only after acceptance of report. **PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

# **ECON 4996 - Honors Thesis in Economics**

**Credit Hours:** (3) **Description:** Independent research open only to students enrolled in Economics Honors Program. Honors thesis supervised by three-faculty committee selected by student and approved by Economics Honors Committee. **PREREQUISITE:** permission of Economics Honors Committee.

### EDPR 2111 - Development Across Lifespan

**Credit Hours:** (3) **Description:** Principles and processes of human development across the life span.

High Impact Practice Code: Learning Community

# EDPR 3121 - Learning Process/Assessment

**Credit Hours:** (3) **Description:** Major theories and perspectives on classroom learning and classroom assessment practices; emphasis on cognitive processes, individual differences, strategies for instruction, motivation, critical thinking, and self regulation of learning; developing and using classroom assessment and interpreting standardized testing. **PREREQUISITE:** EDPR 2111, or permission of instructor.

#### EDPR 3302 - Child/Adolescent Development

**Credit Hours:** (3) **Description:** Principles and processes of child and adolescent development applied to education. **PREREQUISITE:** EDPR 2111 or permission of instructor.

# EDPR 4008 - Prob: Ed Psych/Research

**Credit Hours:** (1-3) **Description:** Individually directed reading, field study or research; written report required. **PREREQUISITE:** permission of instructor.

#### **EDPR 4009 - Directed Reading**

**Credit Hours:** (1-3) **Description:** This course consists of individually directed readings, a field study, or research, culminating in a written report. **PREREQUISITE:** Permission of the instructor.

Credit Hours: (1-3) Description: Students investigate issues surrounding selected economic problems and develop reports of that The online catalog can be accessed at: http://catalog.memphis.edu/index.php

### **EDPR 4010 - Supervised Research**

**Credit Hours:** (1-3) **Description:** Collaborative research with faculty to include planning, design, management, analysis, and reporting of research. **PREREQUISITE:** Permission of instructor.

# EDPR 4100-4109 - Special Topics in Educational Psychology and Research

**Description:** (3) This course is designed to study special topics, specific to the theme selected by the instructor.

# EDPR 4301 - Early Child Dev/Begin Teacher

**Credit Hours:** (3) **Description:** Philosophy, theory, research, and pedagogy relating to the physical, cognitive, social, and emotional development of children from birth to eight years of age. **PREREQUISITE:** EDPR 2111 and Junior Status.

# EDPR 4541 - Fundmntl/Applied Stat Method

**Credit Hours:** (3) **Description:** Use of statistical techniques in education and behavioral sciences; emphasis on practical use and interpretation of concepts. Self-instructional.

### EDSV 4750 - Problems/Ed Services

**Credit Hours:** (1-3) **Description:** Independent study and field projects on selected problems, interests, and needs related to educational programs in training settings.

# EDSV 4850 - Practicum/Training Settings

**Credit Hours:** (1-3) **Description:** Opportunities to gain experience in a variety of settings; tailored to interests, needs and career pathways of student. **PREREQUISITE:** approval by program coordinator. (S/U)

# EDSV 4950 - Internship/Training Settings

**Credit Hours:** (3-12) **Description:** Planned and supervised full-time experience in a training setting appropriate to the student's specialization area; opportunities to synthesize knowledge and skills and demonstrate professional competencies in an appropriate setting. **PREREQUISITE:** approval

# **EECE 1206 - Computer Engr Computations**

**Credit Hours:** (4) **Description:** Structured solutions in computer engineering problems; computer implementation of solutions. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 1202, or sophomore standing.

# **EECE 1207 - Electrical Engr Computations**

1207 Credit Hours: (3) Description: Structured solutions to electrical engineering problems through use of computers. PREREQUISITE: EECE 1202 or sophomore standing.

# EECE 1208 - Intro EECE Lab

**Credit Hours:** (1) **Description:** Laboratory techniques in solutions to electrical and computer engineering problems; software/hardware development tools. Three laboratory hours per week. **COREQUISITE:** ENGR 1010.

### EECE 2201 - Circuit Analysis I

**Credit Hours:** (3) **Description:** Fundamental properties of electrical circuits; basic concepts and circuit elements; network theorems; steady-state and transient analyses. Experimental verification of basic electric circuit theory. Three lecture hours. **PREREQUISITE:** ENGR 1010

# EECE 2203 - Electrical and Computer Engineering Lab 1

**Credit Hours:** (1) **Description:** Introduction to utilization of meters, oscilloscopes, oscillators, power supplies, and related test equipment in experimental verification of basic electric circuit theory. Fee Engineering Course Fee **COREQUISITE:** EECE 2201.

# **EECE 2207 - Engineering Math Applications**

**Credit Hours:** (3) **Description:** Introduction to Matlab programming techniques through implementation of relevant engineering application. **PREREQUISITE:** ENGR 1010.

# **EECE 2222 - Digital Circuit Design**

**Credit Hours:** (4) **Description:** Review of number systems and base conversions; analysis and design of digital circuits; logic and sequential design; introduction to microprocessors and modern CAD tools; VHDL. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 1207 or COMP 1900.

#### **EECE 2281 - Instrumentation Lab**

**Credit Hours:** (1) **Description:** Introduction to basic meters, power supplies, test equipment; transient responses and AC power measurements; operational amplifier circuits, bridge circuits and transducers. Does not fulfill degree requirements for Electrical and Computer Engineering majors. Three laboratory hours per week. **COREQUISITE:** EECE 2283.

# EECE 2283 - Electrical Engr/Instrumntation

**Credit Hours:** (3) **Description:** Analysis of electrical circuits, sinsoidal steady state analysis, instrumentation circuits, op amps, transducers. Does not fulfill degree requirements for Electrical and Computer Engineering majors. **PREREQUISITE:** MATH 1920 and PHYS 2120.

### EECE 3201 - Circuit Analysis II

**Credit Hours:** (4) **Description:** Laplace transform techniques for network analysis, sinusoidal steady-state response of single and three phase circuits, resonant circuits, linear transformers and magnetic coupling, and introduction to filter design. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 2201, EECE 2207, MATH 2120 or MATH 3402.

#### EECE 3203 - Signals and Systems I

**Credit Hours:** (3) **Description:** Introduction to continuous-time signals and systems in time and frequency domains; system analysis of linear, time-invariant systems using Laplace and Fourier transforms and Fourier series. **PREREQUISITE:** EECE 2201, EECE 2207; MATH 2120 or MATH 3402.

#### EECE 3204 - Signals and Systems II

**Credit Hours:** (3) **Description:** Introduction to discrete-time signals and systems in time and frequency domains; frequency representation of signals using discrete Fourier series, discrete Fourier transforms and Z transforms. **PREREQUISITE:** EECE 3203

### EECE 3211 - Electronics I

**Credit Hours:** (3) **Description:** Solid state devices as elements of electronic circuits; linear models and linear operation of these devices emphasized. Three lecture hours per week. Fee Engineering Course Fee Three lecture hours and three laboratory hours per week. **PREREQUISITE:** EECE 2201

#### EECE 3212 - Electronics II

**Credit Hours:** (4) **Description:** Utilization of devices in linear, nonlinear, and switching modes of operation; modeling and simulation of electronic circuits. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 2222, EECE 3201, EECE 3211.

# EECE 3213 - Electrical and Computer Engineering Lab 2

Credit Hours: (1)

**Description:** Emphasis on laboratory techniques in performance of basic electronic experiments.

Fee Engineering Course Fee **PREREQUISITE:** EECE 2203 **COREQUISITE:** EECE 3211

#### **EECE 3221 - Matrix Computer Methods**

**Credit Hours:** (3) **Description:** Fundamentals of matrix theory; application of matrix theory and digital computer techniques to the solution of circuit problems; state equations and their application to the solution of systems of differential equations. **PREREQUISITE:** EECE 2201.

#### 1208 EECE 3240 - Electromagnetic Field Theory

**Credit Hours:** (3) **Description:** Maxwell's equations electrostatics, magnetostatics and time varying electromagnetic fields and waves. **PREREQUISITE:** PHYS 2120; MATH 2110 or MATH 2422; MATH 2120 or MATH 3402.

#### EECE 3270 - Intro to Microprocessor

**Credit Hours:** (4) **Description:** LSI circuitry, microprocessor architecture, hardware and software integration, application and system design. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 2222.

#### **EECE 4081 - Software Engineering**

**Credit Hours:** (3) **Description:** Scope of software engineering; software life cycle models; software process; team organization; requirements, analysis and design methodololgies; metrics, inspections, testing strategies and maintenance; software risks; professional and ethical responsibilities. **PREREQUISITE:** COMP 2150. *Cross listing:* (Same as COMP 4081).

#### **EECE 4201 - Energy Conversion**

**Credit Hours:** (4) **Description:** Energy conversion by electromechanical processes, energy relations in magnetic systems, mathematical modeling of magnetic systems, transformers and electrical machines. Testing of direct and alternating current equipment. Three lecture hours and three laboratory hours per week. **PREREQUISITE:** EECE 2283 or EECE 3201 and minimum grade of C- in all prerequisites.

#### **EECE 4202 - Electrical Power Systems**

**Credit Hours:** (3) **Description:** Investigation of problems associated with transmission of electrical energy; load-flow studies, and fault analysis by use of symmetrical components. **COREQUISITE:** EECE 4201.

#### EECE 4203 - Energy Conversion Lab

**Credit Hours:** (1) **Description:** Fundamental properties associated with testing and utilization of direct current and of alternating current equipment such as motors, generators, alternators and transformers. **COREQUISITE:** EECE 4201.

#### **EECE 4204 - Power Distribution System**

**Credit Hours:** (3) **Description:** Distribution of power from transmission systems to users; primary and secondary feeders, voltage regulation; distribution transformers; overhead, underground and network distribution system design; lightning phenomena and protective device coordination. **COREQUISITE:** EECE 4201.

# EECE 4205 - Modern Grid with Renewables

**Credit Hours:** (3) **Description:** Introduction to alternative energy, wind generator systems, photovoltaic (PV) systems, wave or ocean energy systems, high voltage DC transmission. **PREREQUISITE:** ^EECE 2201

### **EECE 4206 - Electrical Power Quality**

**Credit Hours:** (3) **Description:** Power quality phenomenon, voltage sags and interruptions, transient overvoltages, long-duration voltage variations, fundamental of harmonics, distributed generation and power quality, power quality benchmarking and monitoring. **PREREQUISITE:** EECE 4201 and EECE 3203

# EECE 4213 - Antenna Theory/Design

**Credit Hours:** (3) **Description:** Theory of operation and design of antennas; determination of antenna radiation characteristics; introduction to antenna array theory. **PREREQUISITE:** MATH 2110.

### EECE 4214 - Electromagnetic Fields Lab

**Credit Hours:** (1) **Description:** Laboratory techniques associated with frequencies above 100 MHz. **COREQUISITE:** EECE 4215.

### **EECE 4215 - Applied Electromagnetic Fields**

**Credit Hours:** (3) **Description:** Steady state and transient solutions of transmission line equations; plane waves; antennas in telecommunications. **PREREQUISITE:** MATH 2110.

#### **EECE 4221 - Electronics III**

**Credit Hours:** (4) **Description:** Applications of analog and digital electronic circuits; special purpose circuits and devices. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** EECE 3211.

# EECE 4222 - Digital Logic/Computer Design

**Credit Hours:** (3) **Description:** Applications of digital system design using MSI, LSI, and VLSI circuits; design of arithmetic logic units, multiple-input controllers, and practical interfacing techniques. **PREREQUISITE:** EECE 2222.

# EECE 4230 - Data Communication System

**Credit Hours:** (3) **Description:** Data communications in information and computing systems; analog and digital means of transmitting and controlling information; organization and requirements of data communication systems including modulation and demodulation, multiplexing, switching, error detection and correction. **PREREQUISITE:** EECE 3204.

# **EECE 4231 - Communication Theory**

**Credit Hours:** (3) **Description:** Frequency and time domain; modulation, random signal theory, autocorrelation; noise, communication systems. Fee Engineering Course Fee **PREREQUISITE or COREQUISITE:** EECE 4235

#### **EECE 4232 - Discrete Signal Process**

**Credit Hours:** (3) **Description:** Introduction to discrete-time signal analysis; includes discrete system concepts, discrete-time Fourier analysis, sampling of continuous-time signals, z-transform, and transform analysis of discrete time systems; structures for discrete-time systems and discrete filter design techniques. **PREREQUISITE:** EECE 3204.

### EECE 4235 - Probabilistic System Analysis

**Credit Hours:** (3) **Description:** Probability and statistics applied to electrical and computer engineering problems; probability and random variables; statistics and techniques for estimating them; techniques for characterization of signals using autocorrelation, cross-correlation and power spectra; determination of effects of discrete and analog filters on random signals, Bayesian detection and estimation; Markov random processes. **PREREQUISITE:** EECE 3203

### **EECE 4241 - Solid State Physcl Electronics**

**Credit Hours:** (3) **Description:** Quantum concepts; statistics; crystal structure; conduction processes in solids; p-n junctions and devices; field-effect devices; charge transfer devices. **PREREQUISITE:** EECE 3211.

#### **EECE 4242 - Electro-Optics**

**Credit Hours:** (3) **Description:** Classical optics including Gaussian optics, Newtonian optics, and vergence theory; optical design with aberration concepts, F-numbers, pupils, and stops; radiometry with respect to flux transfer calculations; light sources and detectors.

# **EECE 4243 - Linear Optical Systems**

**Credit Hours:** (3) **Description:** Review of Fourier techniques for analysis and design of linear systems, extension to 2dimensional techniques, 2-dimensional transform applied to linear optical systems and optical data processing. **PREREQUISITE:** EECE 3204.

# EECE 4251 - Control System Engr

**Credit Hours:** (3) **Description:** General equations of physical linear systems and their transfer functions; transient analysis and stability of servo systems; Bode plot, Nichols chart, Nyquist plot, Routh criterion, root locus methods, introduction to compensation techniques and systems in state space. **PREREQUISITE:** EECE 3203, MATH 3242.

# **EECE 4252 - Digital Control Systems**

**Credit Hours:** (3) **Description:** Problems and analysis techniques applicable to digital control systems. Prior knowledge of Laplace transforms required; basic knowledge of feedback control theory desirable. **PREREQUISITE:** EECE 3204, MATH 3242.

# EECE 4253 - Control Systems Lab

**Credit Hours:** (1) **Description:** Investigations of fundamental properties associated with control systems engineering; laboratory procedures in analysis of control systems, compensating networks, analog and digital computer simulations. **COREQUISITE:** EECE 4251 or EECE 4252.

# EECE 4254 - Digital Control System Lab

**Credit Hours:** (1) **Description:** Investigations of fundamental properties associated with digital control systems engineering; laboratory procedures in analysis of digital control systems, compensating networks, digital computer simulations and PLCs. **COREQUISITE:** EECE 4252.

# **EECE 4271 - Computer Interfacing**

**Credit Hours:** (3) **Description:** Hardware and software aspects of connecting computers to peripherals; tradeoffs between hardware and software; connecting CPUs to ROM, RAM, parallel ports and serial ports; applications to serial and parallel ports; backplane buses, displays, keyboards, A/D and D/A converters; linking interface routines to application software. **PREREQUISITE:** EECE 2222, or permission of instructor.

# **EECE 4272 - Engineering Software**

**Credit Hours:** (3) **Description:** Procedural and object-oriented programming techniques using C and C++. Introduction to UNIX. **PREREQUISITE:** EECE 2207, or equivalent.

# **EECE 4273 - Database Engineering**

**Credit Hours:** (3) **Description:** Logical database design, data models for database engineering; entity-relationship, relational, object oriented, logic data models; design theory for relational databases, relational query languages, introduction to integration of database and knowledge-base systems for engineering applications; emerging trends in database machine design and implementation. **PREREQUISITE:** permission of instructor.

# **EECE 4275 - Network Programming**

**Credit Hours:** (3) **Description:** Introduction to engineering of computer networks, network hardware, and network software; design of software systems for network applications. **PREREQUISITE:** EECE 1207 or COMP 1900.

# EECE 4276 - Adv Network Programming

1210 Credit Hours: (3) Description: Advanced methods for engineering software systems; implementations of distributed object models, remote database connectivity, and reusable software components. PREREQUISITE: EECE 4275, or permission of instructor.

#### **EECE 4277 - DSP Microprocessors**

**Credit Hours:** (4) **Description:** Architecture and instruction sent of fixed-point and floating-point devices; hardware interfacing, host communication, real-time signal generation, filtering, and code development using assembly language and C. **PREREQUISITE:** EECE 2222 and EECE 3204.

# **EECE 4278 - Computer Organization**

**Credit Hours:** (3) **Description:** Organization and structure of CPU, memory, operating system, I/O system organization and implementation issues; hardware and software integration and codesign. **PREREQUISITE:** EECE 3270.

### **EECE 4279 - Professional Development**

**Credit Hours:** (3) **Description:** Design, ethics, standards, participation in professional organizations; preparation for licensing; preparation for senior design project; contemporary issues and the impact of engineering solutions in a global, economic, environmental, and societal context. **PREREQUISITE:** EECE 3201, EECE 3211, EECE 3270.

# EECE 4280 - Electricl/Computer Engr Design

**Credit Hours:** (3) **Description:** Individual and/or team design projects that require application of electrical engineering or computer engineering concepts. Oral and written presentations required. **PREREQUISITE:** EECE 3204, EECE 4279, EECE 4991; for BSCPE degree: EECE 4081.

# **EECE 4710 - Computer Architecture**

**Credit Hours:** (3) **Description:** Architecture and design of computers, performance measures, instruction sets, datapaths, I/O systems, and memory hierarchies. **PREREQUISITE:** EECE 4278.

#### **EECE 4711 - Fault Tolerant Computer Des**

**Credit Hours:** (3) **Description:** Evaluation of computer system design and reliability using reliability block diagrams, fault trees, reliability graphics, queuing networks, error detecting and correcting codes, and Markov models; principles of fault tolerant hardware and software design. **PREREQUISITE:** EECE 4278.

# EECE 4712 - Embedded Systems

**Credit Hours:** (3) **Description:** Introduction to hardware/software codesigned embedded systems for wearables, Internet-of-Things (IoT), robotics, and other smart devices. Course content includes discussion on system modeling, hardware design, software programming, realtime data processing, adaptive and intelligent algorithms, prototyping, testing, optimization, and regulation. **PREREQUISITE:** EECE 3270. Laboratory involves of use of synthesis tools, programmable logic, microcontrollers, and development of working embedded systems.

# EECE 4720 - Intro Artificial Intelligence

**Credit Hours:** (3) **Description:** Fundamentals of programming in LISP; central ideas of artificial intelligence, including heuristic search, problem solving, slot-and-filler structures, and knowledge representation. **PREREQUISITE:** EECE 2207, permission of instructor. *Cross listing:* (Same as COMP 4720).

# EECE 4730 - Expert Systems

**Credit Hours:** (3) **Description:** Fundamentals of programming in PROLOG, central ideas of expert system development, including knowledge representation, control structures, tools, knowledge acquisition, and knowledge engineering. **PREREQUISITE:** EECE 2207, or permission of instructor. *Cross listing:* (Same as COMP 4730).

# EECE 4731 - Data Visualization

**Credit Hours:** (3) **Description:** Introduction to the terminology, methodology, and applications of data visualization. Methods for visualizing data from a variety of engineering and scientific fields including both static and time varying data and methods for generating both surface and volume visualizations. **PREREQUISITE:** COMP 2150, or permission of instructor. *Cross listing:* (Same as COMP 4731).

# EECE 4741 - Intro to Neurocomputing

**Credit Hours:** (3) **Description:** Topics include connectionist datadriven AI; Learning algorithms; Least-mean squares; Supervised learning algorithms (perceptrons. backpropagation and its variants, recurrent neural nets); Unsupervised methods (Hebbian, competitive and reinforcement learning); Deep Learning; Computing platforms for neural nets; case studies. (Same as COMP 4741) Fee \$45.00 **PREREQUISITE:** COMP 2150 and MATH 3242, or permission of instructor. *Cross listing:* COMP 4741

# EECE 4900-4909 - Special Topics in Electrical and Computer Engineering

**Credit Hours:** (1-3) **Former:** (ELEC) **Description:** Topics are varied and in online class listings.

# EECE 4910-4919 - Honors Special Topics

**Credit Hours:** (3) **Former:** (ELEC) **Description:** Topics vary and in online class listings. **PREREQUISITE:** approval by the Honors Committee of the Department of Electrical and Computer Engineering.

#### 1211 EECE 4991 - Electrical/Computer Projects I

**Credit Hours:** (3) **Description:** Independent investigation of problem selected in consultation with instructor; report required. Fee Engineering Course Fee **PREREQUISITE:** EECE 3201, EECE 3203, EECE 3211, EECE 3213

# EECE 4992 - Electrical/Computer Project II

**Credit Hours:** (1-3) **Description:** Design, implementation and testing of a project approved by the EECE Faculty that will supervise the project; a final project report is required. Fee Engineering Course Fee **PREREQUISITE:** EECE 4991 with a minimum GPA of 2.0 in EECE courses completed at the University of Memphis. **No** 

#### **EECE 4993 - Research Studies**

**Credit Hours:** (3) **Description:** Consultation, reading, and design work to investigate selected areas of electrical engineering or computer engineering under supervision of faculty member; formal paper required; emphasis on applied work, design, and scientific writing. **PREREQUISITE:** permission of instructor.

# EECE 4994 - Electrical/Computer Engineering Practicum

**Credit Hours:** (1) **Description:** Preparation for professional practice through experiental learning under the supervision of an experienced engineer with oversight by a member of the department's faculty. Students must work a minimum of 10 hours, and no more than 20 hours per week. Regular reporting throughout course required. Maximum repeat for 3 hours credit, but student may not enroll in EECE 4994 for more than 1 credit hour per semester. Cannot be taken concurrently with ENGR 4001 . **PREREQUISITE:** Departmental approval

# **EECE 4999 - Honors Thesis**

**Credit Hours:** (3) **Description:** Under the direction of a faculty member, the student writes and defends a thesis based upon background reading and experimental research on a topic in electrical engineering. **PREREQUISITE:** approval by the Honors Committee of the Department of Electrical and Computer Engineering.

# ELED 3242 - Teaching/Learning Elem School

**Credit Hours:** (3) **Description:** Focus on best practices for student learning and cognition in grades K-6; identification, development, and evaluation of strategies and models of instruction sensitive to individual needs of children; emphasis on planning and instruction.

#### ELED 3251 - Method/Teach Math/Elem Grades

**Credit Hours:** (3) **Description:** Instructional techniques, curriculum, and materials for teaching mathematics to elementary school students.

# ELED 3261 - Method/Teach/Science/Elem Grde

**Credit Hours:** (3) **Description:** Instructional techniques, curriculum. and materials for teaching science to elementary school students. **PREREQUISITE:** admission to TEP.

# ELED 3271 - Method/Social Studies/Elem Grd

**Credit Hours:** (3) **Description:** Instructional techniques, curriculum, and materials for teaching social studies to elementary school students. **PREREQUISITE:** ELED 3242, SPED 2000.

### ELED 3281 - Residency I/Elem Teach Pract

**Credit Hours:** (3) **Description:** Integration of curriculum and instruction for K-6 grades; extended field experiences involving observation and teaching in diverse classrooms. **PREREQUISITE:** admission to TEP and completion of all coursework except Residency II semester. **COREQUISITE:** ELED 3251, ELED 3261.

# ELED 4351 - Teaching/Learning K-8

**Credit Hours:** (2) **Description:** Teacher candidates develop knowledge of best practices for student learning and cognition; identify, develop, and evaluate strategies and techniques of instruction that are sensitive to individual needs of children within a culturally and economically diverse population; emphasis on planning, instruction, assessment, and professional development. Ten hours field experiences. **PREREQUISITE or COREQUISITE:** ELED 4352, ELED 4353, ELED 4354, admission to TEP, and completion of ALL coursework except Student Teaching and Professional Seminar.

# ELED 4352 - Curriculum and Methods K-8

**Credit Hours:** (4) **Description:** Teacher candidates will learn developmentally appropriate curriculum for K-8 in literacy, science, mathematics, social studies, and fine arts; methods specific to content areas and evaluate current educational materials such as software, textbooks, and manipulatives. Twenty hours field experiences. **PREREQUISITE or COREQUISITE:** ELED 4351, ELED 4353, ELED 4354, admission to TEP, and completion of ALL coursework except Student Teaching and Professional Seminar.

#### **ELED 4353 - Thematic Instruction K-8**

**Credit Hours:** (4) **Description:** Curriculum, methods, and materials for teaching integrated curriculum with a focus on real-world experiences with diverse students in urban settings; teacher candidates will develop and use a thematic unit to instruct K-8 students; emphasis includes critical reflection of how to improve learning and instruction for all students. Twenty hours field experiences. **PREREQUISITE or COREQUISITE:** ELED 4351, ELED 4352, ELED 4354, admission to TEP, and completion of ALL coursework except Student Teaching and Professional Seminar.

# ELED 4354 - Practicum Integrative Urb Envn

1212 for observation and teaching diverse learners in real-world situations. **PREREQUISITE or COREQUISITE:** ELED 4351, ELED 4352, ELED 4353, admission to TEP, and completion of ALL coursework except Student Teaching and Professional Seminar.

#### **EMGT 3100 - Seminar in Emergency Management**

**Credit Hours:** (3) **Description:** Synthesizing and integrating the various elements of emergency management. *Cross listing:* (Same as ESCI 3100, UNIV 3100 and PADM 3100).

#### EMGT 4000 - Internship

**Credit Hours:** (3) **Description:** Experience working with an agency, business, or organization in which knowledge of emergency management can be applied and expanded. **PREREQUISITE:** EMGT 3100 or permission of instructor. (S/U)

### ENGR 1009 - Prep Math for Engineering

**Credit Hours:** (3) **Description:** Applications of algebra and trigonometry to engineering problems. Accelerated preparation for an engineering or technology major. Fee Engineering Course Fee Three lecture hours per week. **COREQUISITE:** MATH 1710

### **ENGR 1010 - Engineering Problem Solving**

#### Credit Hours: (3)

**Description:** Introduction to the methods of engineering problem solving. Application of mathematical concepts to solve engineering problems. Fee Engineering Course Fee \$45 per credit hour Two lecture hours, three laboratory hours per week. **PREREQUISITE:** ENGR 1009 or MATH 1710 with grade of C- or better.

**PREREQUISITE or COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910 with a grade of C- or better.

#### ENGR 1011-1025 - Special Topics in Engineering

**Credit Hours:** (1-4) **Description:** Topics in Engineering of interest to the beginning students in engineering.

#### **ENGR 4001 - Engineering Work Experience**

**Credit Hours:** (1-3) **Description:** Off-campus work experience working on selected projects in coordination with the department chair or chair's designee in student's major department under direction of practicing engineer. Oral and written presentations may be required. Repeatable May be repeated as many times as student chooses. NOTE: Students participating in ENGL 4001 are considered to be full-time students for enrollment certification purposes. **PREREQUISITE:** chair's and CO-OP director's approvals.

#### **TECH 1010 - Computer Applications in Tech**

**Credit Hours:** (2) **Description:** Integration of the curriculum and teaching for K-8 grades that includes urban site visitation experiences

**Credit Hours:** (3) **Description:** Introduction to computer applications using PC's networked; file management; spreadsheets; presentation graphics; Internet application in technology.

# **TECH 1211 - Computer Programming**

**Credit Hours:** (3) **Former:** (CETH) **Description:** Computer usage in engineering technology; emphasis on use of computer programming in solving technical problems. Two hours lecture; 3 hours lab per week. **PREREQUISITE:** TECH 1010.

# **TECH 1411 - Introduction to Technology**

**Credit Hours:** (2) **Description:** Emphasis on engineering technology programs relative to content and opportunities upon graduation; professionalism and ethics technical careers; communication in technical careers; activities related to various technological disciplines; approaches to basic research techniques and problem solving. 1 lecture hour, 3 laboratory hours per week.

# **TECH 1521 - Graphics/Descriptive Geometry**

**Credit Hours:** (3) **Description:** Orthographic projections, sections, pictorials; drafting with instruments, sketching, and introduction to computer aided drafting. Auxiliary views and revolutions, profiles, vector graphics and developments. Two lecture hours, three laboratory hours per week.

# **TECH 1711 - Manufacturing Process I**

**Credit Hours:** (3) **Former:** (METH) **Description:** Metal manufacturing processes, including traditional machining, computer numerical control, and thermal metal cutting/joining; measurement, layout, and inspection techniques as applied to integrated manufacturing systems; coverage of threads, fasteners, and geometric dimensioning and tolerancing. Two lecture hours, three laboratory hours per week.

# **TECH 1811 - Electronic Circuit Technology**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Introduction to fundamental electronic theory and devices, circuit and network theorems. Laboratory emphasis on basic electrical measurements and proper use of instruments. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** MATH 1720 or MATH 1730, TECH 1010.

# TECH 2251 - Adv Programming Technology

**Credit Hours:** (3) **Former:** (CETH) **Description:** Principles of computer programming applicable to engineering technology; algorithmic problem solving, coding in a structured, object oriented, high level language, subprograms and parameters, control structures, I/O, complex arithmetic, and double precision operations emphasized. Three lecture hours per week. **PREREQUISITE:** TECH 1211.

**Credit Hours:** (3) **Former:** (CETH) **Description:** Application of high speed digital computer to problems associated with storage and retrieval of numeric and non-numeric data in engineering systems; representation and organization for storing of data, searching and sorting techniques, decision tables, and file maintenance techniques. Database applications. Three lecture hours per week. **PREREQUISITE:** <u>TECH 2251</u>

# **TECH 2812 - Basic Industrial Cntrol Device**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Theory and applications of devices commonly used in modern industrial control; including transistors, operational amplifiers, thyristors, and solid-state logic. Applications and characteristics of motors and control system I/O devices. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1811.

# **TECH 2813 - Industrial Control Systems**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Theory and operation of logic control systems: including relay ladder logic, solid-state logic, and programmable logic controllers. Emphasis on practical industrial applications. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2812.

### **TECH 2821 - Solid State Technology**

**Credit Hours:** (3) **Former:** (EETH 2821) **Description:** Theory of solid-state devices with application in power supplies, amplifiers, and other basic electronic circuits. Solid-state diodes and bipolar junction transistors emphasized. Three lecture hours, two laboratory hours per week. **PREREQUISITE:** TECH 1811.

# **TECH 2822 - Circuit Analysis**

**Credit Hours:** (4) **Former:** (EETH 2820) **Description:** Circuit analysis methods in modern electronics engineering technology; laboratory confirmation of mathematical solutions to problems involving direct and alternating currents. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1811.

# **TECH 2831 - Advanced Solid State Tech**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Theory of field effect transistors and operational amplifiers. Emphasis on practical applications, including amplifiers, filters, and oscillators. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2822, TECH 2821, MATH 1910.

# **TECH 2908 - Applications of Technology**

**Credit Hours:** (2) **Description:** Investigation, analysis and problem solving solutions for various problems in Engineering Technology. 1

lecture hour, 3 laboratory hours per week. **PREREQUISITE:** TECH 1010, TECH 1211, TECH 1521, TECH 1711, and TECH 1811.

# **TECH 3044 - Analysis for Engineering Tech**

**Credit Hours:** (4) **Description:** Application of mathematical, scientific, and engineering principles to solution of technology problems, using a variety of examples from various major areas in Technology; analyze and provide acceptable solutions to ascending order of well designed problems using language and techniques or related technological disciplines and selected areas of mathematics, such as algebra, trigonometry, calculus, applied industrial statistics, and differential equations. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** MATH 1910, PHYS 2010, and TECH 2822.

# **TECH 3232 - Digital Technology**

**Credit Hours:** (4) **Former:** (CETH) **Description:** Numbering systems and codes, logic gates, Boolean algebra, Combinational logic, TTL circuits, and memory devices. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1811.

# **TECH 3233 - Microproc & Interfacing**

**Credit Hours:** (4) **Former:** (CETH) **Description:** Computer history and architecture of microprocessors and microcontrollers including bus architecture, memory, internal CPU architecture, hardware/software interaction, high and low level language programming and input and output operations. Three lecture hours and three laboratory hours per week. **PREREQUISITE:** TECH 1211 and TECH 3232, TECH 2821.

#### **TECH 3241 - Internet Technology**

**Credit Hours:** (3) **Former:** (Was TECH 4241, CETH 3241, CETH 4241) **Description:** Internet services and protocols; covering the top three layers of the OSI model; session presentation, and application layers. Two hours lecture and three hours lab per week. **PREREQUISITE:** TECH 2251.

#### **TECH 3251 - Assembly Language Program**

**Credit Hours:** (4) **Former:** (CETH) (TECH 4251) **Description:** Microcomputer programming using assembly language instructions, DOS function calls, and BIOS functions. Microprocessor architecture. Using an assembler to create executable files from assembly language programs. Text and graphic displays using assembly language programs. Application programs for input-output devices. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3233.

# **TECH 3281 - Computer Aided Circuit Design**

**Credit Hours:** (4) **Former:** (CETH) **Description:** Utilization of commercially available software for electronic circuit documentation, analysis and design; schematic capture, printed circuit board design, and circuit simulation. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2831, TECH 3232.

#### **TECH 3386 - Occupational Safety**

**Credit Hours:** (3) **Former:** (METH) **Description:** Hazards and safety procedures for general industry and construction.

#### **TECH 3401 - Strength of Materials**

**Credit Hours:** (3) **Former:** (METH) **Description:** Force systems and their solution; that branch of mechanics dealing with forces and effects of forces including stress strain and deformation of bodies at rest; analysis of frames and mechanisms. **PREREQUISITE:** MATH 1910, PHYS 2010/PHYS 2011. **COREQUISITE:** TECH 3044.

#### **TECH 3408 - Industrial Materials**

**Credit Hours:** (3) **Former:** (METH) **Description:** Material properties and the methods/standards used in testing these properties for metals, ceramics, polymers, and composites; emphasis on their mechanical properties; reinforced by testing in the laboratory, library and internet research, spreadsheet applications, written reports, and oral presentations. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3401, TECH 3462. **COREQUISITE:** TECH 3421.

#### **TECH 3421 - Manufacturing Process II**

**Credit Hours:** (4) **Former:** (METH) **Description:** Processes and techniques used to fabricate industrial materials into useful products; techniques covered include casting and molding, forming, separating, conditioning, assembling, finishing; CNC programming concepts and process design and control. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1711.

#### **TECH 3440 - Project Plan/Cost Evaluation**

**Credit Hours:** (3) **Former:** (METH) **Description:** Concept of project management and engineering economy; impact of economics in evaluation of alternatives and decision making; spreadsheet development of economic concepts; interest rate compounding effects; present and future valuation; cash flow analysis; application of project management methods and techniques including planning, organizing, leading and controlling of projects. Team projects include case discussions, written reports and oral presentations, and use of project management software. **PREREQUISITE:** MATH 1910, COMM 2381, TECH 2908.

#### **TECH 3462 - Industrial Statistics**

**Credit Hours:** (3) **Former:** (METH) **Description:** Procedures for collecting, describing, presenting and statistically analyzing industrial data; basic probability theory; hypothesis testing and basic concepts of analysis of variance; introduction to Taguchi methods; spreadsheet software used for statistical analysis. **PREREQUISITE:** MATH 1710 or higher, and TECH 1010.

# TECH 3573 - Dynamics/Design/Automation

**Credit Hours:** (3) **Former:** (METH) **Description:** Analysis of rectilinear and curvilinear motion; kinematic analysis of mechanisms; design of mechanical systems; pulleys, gears, belts, motors. **PREREQUISITE:** TECH 3044 and TECH 3401, PHYS 2010/PHYS 2011.

# **TECH 3691 - Construction Estimating**

**Credit Hours:** (3) **Description:** Fundamentals of commercial and light frame estimating; emphasis given to conducting a quantity survey, including unit and overhead costs.

# **TECH 3811 - Electronic Communication**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Principles of analog communications; harmonics; noise, active filters, signal generation; A.M., single side band transmission and reception and F.M. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2831 and TECH 3044.

# **TECH 3812 - Digital Electronic Comm**

**Credit Hours:** (4) **Former:** (EETH) **Description:** Principles of digital communications, spectrum and signal transmission through various mediums. Modulation/demodulation techniques, data rates, quality of signal, current protocols and data packets. Three lecture and three laboratory hours per week. **PREREQUISITE:** TECH 2821, TECH 2822 and TECH 3232

# **TECH 3821 - Industrial Electronics**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Electronic circuits and systems in industry; principles of signal conditioning, DC and AC motors and drives, sensors; process control and PLcs; theory and application of devices such as unijunction transistors, silicon controlled rectifiers, diacs, triacs. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2831 and TECH 3044.

# **TECH 3822 - Programmable Logic Control**

**Credit Hours:** (4) **Former:** (EETH) **Description:** Theory and operation of programmable logic controllers; emphasis on practical industrial applications and programming techniques. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3232 and TECH 3821.

# **TECH 3841 - Electrical Power/Motor Control**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Generation and utilization of AC and DC electrical power; applications and operating characteristics of motors, generators and transformers with emphasis on three-phase power systems. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3821.

# TECH 3940 - Analysis/Public Fire Protect

**Credit Hours:** (3) **Description:** Systems analysis and its use and limitations in fire protection and other problem areas; illustrated with case studies and models using the systems approach to fire suppression and prevention. **PREREQUISITE:** admission restricted to students seeking B.P.S. degree in Fire Administration or Fire Prevention Technology.

#### **TECH 3942 - Fire Related Human Factors**

**Credit Hours:** (3) **Description:** Dynamics of human behavior in fire incidents related to building design, codes and ordinances, and other fire prevention practices. **PREREQUISITE:** admission restricted to students seeking B.P.S. degree in Fire Administration or Fire Prevention Technology.

# **TECH 3944 - Fire Protect Struc/Sys Design**

**Credit Hours:** (3) **Description:** Design principles involved in protection of structure from fire involvement empirical tests and prediction procedures; control detection, and suppression system design practices; fundamentals of hydraulic design of sprinkler and water spray systems with recent innovations. **PREREQUISITE:** admission restricted to students seeking B.P.S. degree in Fire Administration or Fire Prevention Technology.

### **TECH 3945 - Fire Investigation/Analysis**

**Credit Hours:** (3) **Description:** Procedures and techniques for collection, comparison, and analysis of physical evidence related to fire origin; principles of evidence of ignition phenomenon and propagation variables; legislative, economic, psychological, and sociological variables of incendiary fire, role of insurance and government programs. **PREREQUISITE:** students of B.P.S. degree in Fire Administration or Fire Prevention Technology program.

# **TECH 3946 - Fire Dynamics**

**Credit Hours:** (3) **Description:** Fire propagation phenomenon in both fuel and air regulated phases; variables in pre- and postflash over fire development; geometric, material, gaseous, fluid flow, and thermodynamic parameters; compartment and building fire models. **PREREQUISITE:** student of B.P.S. degree in Fire Administration or Fire Prevention Technology program.

# **TECH 3947 - Application of Fire Research**

**Credit Hours:** (3) **Description:** Fire research and its application; transfer and implications of available research results for fire prevention and protection programs; national and international studies and research developments. **PREREQUISITE:** student of B.P.S. degree in Fire Administration or Fire Prevention Technology program.

#### **TECH 3948 - Managerial Issues/Hazard Mtrl**

**Credit Hours:** (3) **Description:** Examination of federal regulatory issues, hazard identification and vulnerability analysis, multiagency contingency planning, response personnel, multi-agency response ttp://catalog.memphis.edu/index.php

resources and systems; discussion of agency policies, public education and emergency information systems, health and safety issues, command post dynamics, strategic and tactical considerations, recovery and termination procedures. **PREREQUISITE:** enrollment in B.P.S. degree in Fire Administration or Fire Prevention Technology program.

### **TECH 4234 - Microprocessors & IOT**

**Credit Hours:** (4) **Description:** Analysis and design of microprocessor based systems utilizing various communication methods and protocols to create Internet of Things (IoT) systems and devices. **PREREQUISITE:** TECH 2831, TECH 3233, TECH 3812 and TECH 3440.

# **TECH 4236 - AutoID Solutions**

**Credit Hours:** (3) **Description:** A study of methods and systems used to automatically identify objects. Various forms of keyless data entry will be studied including; bar coding, radio frequency identification, voice data entry, touch memory. Experiences will emphasize RFID and bar coding technology, including the challenges experienced by manufacturing and the biomedical industry. Two lecture hours, Three laboratory hours per week. **PREREQUISITE:** No prerequisites.

# **TECH 4242 - Client Application Technology**

**Credit Hours:** (3) **Former:** (CETH) **Description:** Hypertext Markup Language (HTML), XML, and script languages. Three lecture hours per week. **PREREQUISITE:** TECH 3241, or permission of instructor.

# **TECH 4262 - Modern Programming**

**Credit Hours:** (3) **Former:** (CETH) **Description:** Application of modern programming languages to problems from selected area of engineering technology; data collection, modeling techniques, constraints, program development and validation. Three lecture hours per week. **PREREQUISITE:** TECH 2251 or equivalent.

# **TECH 4263 - Server Application Technology**

**Credit Hours:** (4) **Former:** (CETH) **Description:** Java exception handling, multithreading, files and streams; JDBC, Servlets, JSP, and JavaBeans server side software. Team projects include written reports. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3440, TECH 4262, or permission of instructor.

# **TECH 4272 - Operating Systems**

**Credit Hours:** (4) **Description:** Operating system structure, memory management (physical, virtual memory), process management (processes, threads, scheduling, synchronization, deadlocks), device management (driver, buffers, queues), file management (implementation, abstraction), installation and configuration of services within UNIX/LINUX operating system, and performance. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3232 or equivalent.

#### 1216 TECH 4281 - Computer Network Technology

**Credit Hours:** (4) **Former:** (CETH) **Description:** Local area networks; covering the bottom four layers of the OSI mode; physical, datalink, network and transportation and application. Extensive laboratory coverage of the installation, configuration and administration of routers, switches and other networking devices. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 2822, TECH 3232 and TECH 3241 or equivalent.

### **TECH 4381 - Principles of Supervision\*\***

**Credit Hours:** (3) **Former:** (METH) **Description:** Practical approach to supervisory management including functions of planning, organization, staffing, employee motivation; coverage of contemporary issues including legal aspect of supervision as well as other regulatory concerns, such as occupational safety, health and labor relations.

# TECH 4401 - Science/Technology/Society

**Credit Hours:** (2) **Description:** Relationship between science, technology and society is investigated through research, reading, discussions, and reports; conditions will be studied that have promoted development through science and technology; evaluation of social, global, political, environmental, cultural and economic effects of those technologies; ethics, impact, and control issues within society. Written essays and team debates. Two lecture hours per week. **PREREQUISITE:** TECH 4381.

#### **TECH 4460 - Work Design/Improvement**

**Credit Hours:** (3) **Former:** (METH) **Description:** Analytical techniques and concepts for work methods improvement, lean operation for production and distribution; performance measurement and evaluation; continuous improvement; fundamentals of human factors and ergonomics; work measurement using time study, predetermined time study systems, work sampling and development of standard data.

# **TECH 4462 - Quality Improvement**

**Credit Hours:** (3) **Former:** (METH) **Description:** Statistical methods for quality analysis and improvement; control charts for variables and attributes, industrial sampling; defect prevention using the Poka-Yoke System; reliability; acceptance sampling; Quality standards, continuous improvement; use of computer software for data analysis and presentation. Two hours lecture; 3 hours lab per week. **PREREQUISITE:** TECH 3044.

# **TECH 4463 - Quality Systems**

**Credit Hours:** (3) **Description:** Investigation and application of quality subjects and techniques used to ensure proper quality outcomes; quality standards (ISO, etc.), TLS; process validation including CAPA, GD&T, CMM, metrology and gage R&R. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 4462.

# **TECH 4464 - Production Control Systems**

**Credit Hours:** (3) **Former:** (METH) **Description:** Functions of planning and controlling production and distribution operations; concepts of JIT, MRP, MRPII, ERP, and Japanese manufacturing techniques; analytical techniques and concepts for line balancing, production and process control, demand management and project management. **COREQUISITE:** TECH 4460, or permission of instructor.

# **TECH 4466 - Facility Design**

**Credit Hours:** (3) **Former:** (METH) **Description:** Integrated approach to design and layout for production and distribution facilities with respect to workstation design, material handling, project and resource planning, production control; use of Computer Aided Design, scheduling and analytical software. Team projects, written reports and oral presentations. **PREREQUISITE:** TECH 3440, TECH 4460 and TECH 4464, or permission of instructor.

# **TECH 4472 - Computer Aided Design**

**Credit Hours:** (3) **Former:** (METH) **Description:** Overview of CAD technology, hardware and software options; parametric solid modeling principles; applications to produce computer generated models, assemblies, photorealistic renderings and working drawings. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1521, TECH 1711, TECH 3401.

# **TECH 4474 - Automation and Robotics**

**Credit Hours:** (3) **Former:** (METH) **Description:** Concepts of automation applied to production, distribution, and industrial robotics. Team project including written report. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 1811, TECH 3440 and PHYS 2010.

# **TECH 4476 - Computer Aided Manufacturing**

**Credit Hours:** (3) **Former:** (METH) **Description:** Computer numerical control programming by manual data input and distributed numerical control by computer assistance; system assessment of CNC machines; components, controls, and tooling for integrated manufacturing environment. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** MATH 1730, TECH 1711, TECH 3421, and TECH 4472.

#### **TECH 4510 - Construction Planning/Schedule**

**Credit Hours:** (3) **Description:** Principles of planning, scheduling, organizing, and controlling construction projects; studies in critical path method (CPM) and PERT, with resource leveling and financial scheduling; computer applications in CPM and PERT emphasized.

# TECH 4571 - Tool Design

**Credit Hours:** (3) **Former:** (METH) **Description:** Design of tooling and work holding systems for the integrated manufacturing environment; geometric dimensioning and tolerancing, fast changeover techniques, hydraulic and pneumatic circuits, achieving world class quality through design. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3401, TECH 3421, TECH 4472.

#### **TECH 4821 - Microwave Technology**

**Credit Hours:** (4) **Former:** (EETH) **Description:** Transition line principles for coax, waveguide and fiber; use of Smith Charts for impedance matching; principles of microwave generation and propagation; measurements such as impedance, antenna gain and VSWR; antenna types, characteristics; radiation patterns. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3821, PHYS 2020.

#### **TECH 4823 - Adv Programmable Logic Control**

**Credit Hours:** (3) **Former:** (EETH) **Description:** Advanced applications of programmable logic controllers, including analog I/O techniques and computer interfacing. Two lecture hours, three laboratory hours per week. **PREREQUISITE:** TECH 3440, TECH 3822, or permission of instructor.

#### **TECH 4943 - Senior Project Plan Seminar**

**Credit Hours:** (1) **Description:** Methodology related to solving problems in engineering technology culminating in an integrative experience through individual and/or team projects and technical proposal with technical presentation. One lecture hour per week. **PREREQUISITE:** ENGL 3603, TECH 3440, students must be within two semesters of graduation, and permission of instructor.

#### **TECH 4944 - Senior Thesis**

**Credit Hours:** (3) **Former:** (CETH, EETH, METH) **Description:** Study and research in specific area culminating in an integrating experience through individual and/or group projects and technical reports. **PREREQUISITE:** TECH 3440 and either ENGL 3601 or ENGL 3603, and senior with two semesters of graduation. Permission of department required.

#### **TECH 4945 - Senior Project**

**Credit Hours:** (2) **Description:** Individual and/or team effort in study and implementation of integrative technical project culminating in technical report and technical presentation. Permits issued to students who have taken the senior exit exam and applied for graduation within the previous 12 months. Two lecture hours per week.

**PREREQUISITE:** TECH 4943, student must be within two semesters of graduation, and permission of instructor.

# TECH 4990-4998 - Special Topics in Engineering Technology

**Credit Hours:** (1-3) **Description:** Varied topics announced in the Schedule of Classes. May be repeated by permission for a maximum of 6 hours. **PREREQUISITE:** Permission of instructor

# **TECH 4999 - Engineering Tech Projects**

**Credit Hours:** (1-3) **Description:** Independent investigation of engineering technology problems in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** senior standing.

# ENGL 1010 - English Composition\*\*

**Credit Hours:** (3) **Former:** ENGL 1101 **Description:** Practice in expository writing with emphasis on content, organization, and style (levels of usage and sentence structure) for different purposes and audiences. **[G]** 

High Impact Practice Code: Learning Community

# ENGL 1020 - English Comp/Analysis\*\*

**Credit Hours:** (3) **Description:** Practice in expository writing that synthesizes ideas from various readings. Includes library work and production of documented papers. **PREREQUISITE:** ENGL 1010 with a minimum grade of "C-," or equivalent. **[G]** 

### ENGL 2201 - Literary Heritage \*\*

**Credit Hours:** (3) **Description:** Major texts of literary heritage; modes of literary expression and cultural context; emphasis on works as products of their historical contexts and as processes shaping human consciousness; composition and critical thinking beyond levels expected of freshmen. **PREREQUISITE:** ENGL 1010 and ENGL 1020, with a minimum grade of "C-," or their equivalent. **[G]** 

# ENGL 2202 - Lit Heritage: African-American \*\*

**Credit Hours:** (3) **Description:** Consideration of major texts of literary heritage with emphasis on African-American culture; modes of literary expression and cultural context; emphasis on work as products of historical contexts and as processes shaping human consciousness; composition and critical thinking beyond levels expected of freshmen. **PREREQUISITE:** ENGL 1010 and ENGL 1020, with a minimum grade of "C," or their equivalent. **[G]** 

# ENGL 3100-3119 - Special Topics in Literature

**Credit Hours:** (1-3) **Description:** Topics are varied and noted in online class listings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3210 - British Lit to 1750 \*\*

**Credit Hours:** (3) **Description:** Survey of major authors, themes, and movements from the medieval period through the 18th century.

1218 **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3212 - 16th Century British Lit

**Credit Hours:** (3) **Description:** Study of the prose, poetry, and drama of 16th century England. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3213 - 17th Century British Lit

**Credit Hours:** (3) **Description:** Study of the prose, poetry, and drama of 17th century England. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3214 - 18th Century British Lit

**Credit Hours:** (3) **Description:** Study of the drama, fiction, poetry, and essays from Restoration and 18th century Britain. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 3215 - Shakespeare I

**Credit Hours:** (3) **Description:** Background in the study of Shakespeare and discussion of selected works. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3216 - Topics in Medieval Literature

**Credit Hours:** (3) **Description:** Study of major authors, themes, and movements from the medieval period. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3220 - British Lit since 1750 \*\*

**Credit Hours:** (3) **Description:** Survey of major authors, themes, and movements from the Romantic period through the present. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3221 - British Lit Romantic Age

**Credit Hours:** (3) **Description:** Survey of major authors, themes, and movements in British Romantic literature. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3222 - British Lit/Victorian Era

**Credit Hours:** (3) **Description:** Study of important writers of poetry, prose, fiction, and drama in the context of the historical and social circumstances of the Victorian period. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3224 - 20th Century British Lit

**Credit Hours:** (3) **Description:** Study of important works of poetry, prose, fiction, and drama written between 1890 and 2000. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 3325 - Af/Am Lit thru Harlem Ren \*\*

**Credit Hours:** (3) **Description:** Examination of works by black authors starting with the Colonial Enlightenment, continuing with slave narratives, and ending with the rise of the black novel. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 3326 - Af/Am Lit since Harlem Ren \*\*

**Credit Hours:** (3) **Description:** Examination of African American literary tradition from the Harlem Renaissance to the present; Chicago writers, integrationist aesthetics of the 1950's; black aesthetics of the 1960's. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 3327 - American Literature to 1865 \*\*

**Credit Hours:** (3) **Description:** Survey of major authors, themes, and movements in American literature from the colonial period through 1865. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 3328 - American Literature since 1865

**Credit Hours:** (3) **Description:** Study of American literature and literary movements from 1865 to the present. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3329 - Major Authors in American Lit

**Credit Hours:** (3) **Description:** Study of several major American authors that represent a literary movement, genre, or shared/contrasting thematic focus within their works. Repeatable May be repeated for a maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 3330 - Place/Time in American Lit

**Credit Hours:** (3) **Description:** Study of American literary works focused on particular geographic spaces and historical periods. Repeatable May be repeated for a maximum of 6 hours credit with a change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

1219 **Credit Hours:** (3) **Description:** Study of children's literature through reading, discussion, and writing about history, characteristics, and authors of its major genres. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 3402 - Science Fiction and Fantasy**

**Credit Hours:** (3) **Description:** Study of the history, conventions, and themes of science fiction and fantasy literature. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3403 - Mythic Backgrounds in Lit

**Credit Hours:** (3) **Description:** Study of Middle Eastern and Greek mythology and their development from Homer, Plato, and Ovid and continuing through Milton; extensive practice in critical thinking, written exposition, methods for source study, and mythic, literary, and cultural analysis. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### **ENGL 3404 - Studies/Popular Texts**

**Credit Hours:** (3-6) **Description:** Selected genres of popular texts, such as science fiction, fantasy, crime, mystery, or biography. Repeatable May be repeated for a maximum of 6 hours credit with a change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 3500 - Practical English Grammar**

**Credit Hours:** (3) **Description:** Extended study of the fundamentals of English grammar, sentence structure, usage, diction, punctuation, and spelling. Does not apply to the English major or minor. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 3501 - Modern English Grammar \*\*

**Credit Hours:** (3) **Description:** Introduction to current grammatical theory; description of sounds, word structures, syntax, and semantics of English within theoretical frameworks. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3511 - Intro to Linguistics \*\*

**Credit Hours:** (3) **Description:** Introduction to the nature and functions of human language, to its structural principles, and to its place in culture and society; emphasis on language diversity and change through history and contact; discussion of language and thought, origin of language, and other topics. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 3521 - The American Language

#### ENGL 3401 - Children's Literature

**Credit Hours:** (3) **Description:** Changing nature and variety of American English, especially in vocabulary and usage, its range, formal, informal, written, colloquial, and standard and dialectal variations; shifting standards of usage especially reflected in dictionaries; appropriateness dependent upon context; and language as both reflector and shaper of thought. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3601 - Technical and Profess Writing \*\*

**Credit Hours:** (3) **Description:** Introduction to rhetoric and style of documents written by scientists, engineers, technical writers, and other professionals; extensive practice in writing reports, proposals, manuals, and correspondence. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3602 - Professional Editing \*\*

**Credit Hours:** (3) **Description:** Workshop in techniques of editing effectively in academic, industry, government, literary, and research settings; developing practical genre familiarity for printed and online formats within those areas. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 3603 - Engineering Communications**

**Credit Hours:** (3) **Description:** Form and contexts of written and oral communications in engineering professions; extensive practice in oral reporting, written reports, manuals, and proposals. Does not apply to the English major or minor. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3604 - Persuasive Writing \*\*

**Credit Hours:** (3) **Description:** Study and practice of writing essays and reports with emphasis on persuasion; introduction to empirical and library research, application of rhetorical principles, and nature of evidence, including numerical; academic and professional writing, editing, and revision. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3606 - Poetry Writing

**Credit Hours:** (3) **Description:** Exploration of the creative process within the forms and traditions of poetry. Emphasis on student's own work. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3607 - Fiction Writing \*\*

**Credit Hours:** (3) **Description:** Exploration of the creative process within the forms and traditions of fiction. Emphasis on the student's own work. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 3608 - Creative Nonfiction Writing**

1220 Credit Hours: (3) Description: Introduction to various forms and traditions of creative nonfiction, including memoir, literary journalism, and personal essay. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 3701 - Lit Criticism/Theory

**Credit Hours:** (3) **Description:** Study of contemporary approached to literary criticism, its premises, and applications. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4001 - Senior Honor Seminar I

**Credit Hours:** (3) **Description:** Intensive study of a problem in language or literature. Enrollment limited to English honors students. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 4101-4110 - Special Topics in English

**Credit Hours:** (3) **Description:** Topics are varied and noted in online class listings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4230 - Chaucer/Medieval World

**Credit Hours:** (3) **Description:** Study of works by Chaucer and his contemporaries in their cultural context. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4234 - Milton

**Credit Hours:** (3) **Description:** Study of the poetic works of John Milton. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4237 - Shakespeare II

**Credit Hours:** (3) **Description:** Analysis of selected plays and study of various approaches to Shakespeare. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4243 - Studies in British Literature

**Credit Hours:** (3) **Description:** Selected literature from a variety of periods in British literary history. Repeatable up to six credit hours **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4323 - Southern Literature

**Credit Hours:** (3) **Description:** Study of selected texts from and about the U.S. South. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 4346 - Studies in Amer Literature

**Credit Hours:** (3) **Description:** Detailed study of selected cultural ideas as they reflect on and are reflected by American literature. Repeatable May be repeated for a maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4372 - Af/Am Author/Harlem Ren \*\*

**Credit Hours:** (3) **Description:** In-depth study of two or three authors prior to 1930, focusing on relationships among them and comparing their aesthetics. Repeatable May be repeated for maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4373 - Af/Am Author since Harlem Ren \*\*

**Credit Hours:** (3) **Description:** In-depth study of two or three authors since 1930, focusing on relationships among them and comparing their aesthetics. Repeatable May be repeated for maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 4374 - Af/Am Lit Movements \*\*

**Credit Hours:** (3) **Description:** A focused study of African-American literary movements, such as the Harlem Renaissance, Black Arts Movement, or the Black Feminist Movement. Repeatable May be repeated for a maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4430 - Graphic Novel

**Credit Hours:** (3) **Description:** Close study of the nature and cultural significance of the graphic novel genre, characterized by interplay between verbal and visual. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4431 - Contemporary Literature

**Credit Hours:** (3) **Description:** Close study of selected literature from 1960 to present. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4442 - Studies in World Literature

**Credit Hours:** (3) **Description:** Study of literary texts from a variety of national traditions in languages other than English. Readings will be in English. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4451 - Studies/Women and Literature \*\*

1221 Credit Hours: (3) Description: Literature and criticism by and about women. PREREQUISITE: ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4452 - Modern Drama

**Credit Hours:** (3) **Description:** American, British, and European drama from Ibsen to 1950. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### ENGL 4453 - Contemporary Drama

**Credit Hours:** (3) **Description:** American, British, and European drama from 1950 to the present. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4454 - Studies in Forms and Genres

**Credit Hours:** (3) **Description:** Study of a particular literary form and/or genre. Permission of instructor is required. Repeatable May be repeated for a maximum of 6 hours credit with change in course content. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### **ENGL 4456 - Reading in Literary Nonfiction**

**Credit Hours:** (3) **Description:** A close study and critical analysis of the nonfictional literary genres, including but not limited to autobiography, biography, essay, and travel literature. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### **ENGL 4457 - Poetry and Poetics**

**Credit Hours:** (3) **Description:** A study of poetry concentrating on critical analysis of poetic structure and theories. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4461 - Bible as Literature

**Credit Hours:** (3) **Description:** Survey of both Old and New Testaments. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4501 - History of English Lang

**Credit Hours:** (3) **Description:** Development of English from a minor Germanic dialect to a major international language. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4511 - Language and Literature \*\*

**Credit Hours:** (3) **Description:** How linguistics can illuminate the analysis of literature, the nature of literary language, and the linguistic http://catalog.memphis.edu/index.php

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# ENGL 4514 - Residency 1 Practicum in ESL Licensure

**Credit Hours:** 3 **Description:** An in-depth clinical experience designed to provide teacher candidates an opportunity to experience all aspects of being a professional educator in English or ESL. Candidates will be placed in partner schools for the entire first week of school and for multiple days each week of the semester. **PREREQUISITE: PREREQUISITE:** admission to TEP and passing appropriate **PRAXIS** II content knowledge exam. **COREQUISITE:** COREQUISITE: coursework by licensure area with approval from advisor. Permit required; only for students pursuing a BA in English with ESL Licensure. *Cross listing:* ICL 4914

# ENGL 4521 - Language and Society \*\*

**Credit Hours:** (3) **Description:** Place of language in society and how it creates and reflects social relationships; geographical and social dialects, male/female differences, and language of various subgroups within our culture; intensive examination of implications of language differences. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4522 - Gender and Language

**Credit Hours:** (3) **Description:** Study of gender as a variable as it intersects with language use in a variety of contexts, including professional, legal, medical, and academic settings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4530 - Practicum in ESL

**Credit Hours:** (2-6) **Description:** Experience in observing and teaching, peer teaching, and work with an ESL specialist. Repeatable Repeatable for a maximum of 6 hours. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent. (S/U)

# ENGL 4531 - Methods and Techniques ESL \*\*

**Credit Hours:** (3) **Description:** Methods and techniques of teaching English as a Second Language in various settings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4532 - Skills/App/Assess ESL \*\*

**Credit Hours:** (3) **Description:** Approaches to evaluation and means of assessment of language skills, with special emphasis on English as a Second Language. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4533 - ESL/EFL in Multicult Setting

**Credit Hours:** (3) **Description:** Approaches to working with ESL or EFL students in multicultural settings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4540-4550 - Special Topics in Language and Linguistics

**Credit Hours:** (3) **Description:** Topics are varied and noted in online class listings. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 4599 - Forms of Creative Nonfiction**

**Credit Hours:** (3) **Description:** Study of various types of creative nonfiction and the techniques appropriate to each. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 4600 - Creative Nonfiction Workshop**

**Credit Hours:** (3) **Description:** Nature of nonfiction, critical approaches to the genre; practical experience in writing and revising text. Repeatable May be repeated for a maximum of 6 hours credit with permission of instructor. **PREREQUISITE:** ENGL 3607 or ENGL 3608.

# ENGL 4601 - Poetry Workshop

**Credit Hours:** (3) **Description:** The nature of poetry, critical approaches to the poem, and practical experience in writing and revising text. Repeatable May be repeated for maximum of 6 hours credit with permission of instructor. **PREREQUISITE:** ENGL 3606

# ENGL 4602 - Adv Composition \*\*

**Credit Hours:** (3) **Description:** Principles involved in writing clear expository prose; emphasis on application of these principles; analysis of readings and of student's writing. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 4603 - Fiction Workshop**

**Credit Hours:** (3) **Description:** Nature of short story and longer forms of fiction, critical approaches to fiction, and practical experience in writing and revising text. Repeatable May be repeated for maximum of 6 hours credit with permission of instructor. **PREREQUISITE:** ENGL 3607 or ENGL 3608

# ENGL 4604 - Forms of Poetry

**Credit Hours:** (3) **Description:** A study of metrics, forms, and types of poetry in English with attention to the principal traditions and critical ideas associated with the writing of verse in English.

**PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4605 - Forms of Fiction

**Credit Hours:** (3) **Description:** A study of how fiction works through analyzing the short story, the novella, and the novel with attention to technical developments. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4606-4615 - Special Topics in Advanced Technical Writing.

**Credit Hours:** (3) **Description:** Theories, contexts, and practices of writing in the world of technology; topics vary; extensive practice in writing, editing, and preparing technical publications. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 4616 - The Publishing Process**

**Credit Hours:** (3) **Description:** Steps in the publishing process from writing a manuscript to printing it, including the publishing of various genres throughout the world. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# **ENGL 4618 - Document Design**

**Credit Hours:** (3) **Description:** Theories of visual and written communication, focusing on the interrelationship between visual and verbal elements; practice in effective design using layout and graphics software; working on client projects in a collaborative setting. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4619 - Web Design/Online Writing \*\*

**Credit Hours:** (3) **Description:** Principles and techniques of creating online user help for software and usable web sites; emphasis on needs of technical writers in professional development environment; task analysis, information architecture, content management, single sourcing, visual rhetoric, navigation, usability testing; technology tools intensive. Students who have received credit for ENGL 4617 cannot take this course for credit. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

# ENGL 4625 - History of Rhetoric

**Credit Hours:** (3) **Description:** Study of authors from the ancient Greeks to the 20th century who were instrumental in shaping the Western conceptions of rhetoric.

# ENGL 4640 - Internship in English

**Credit Hours:** (3) **Description:** Experience with a local community partner requiring the assistance of English majors with strong oral and

written communication skills. Dependent upon availability. **PREREQUISITE:** ENGL 1010, ENGL 1020, and ENGL 2201/ENGL 2202; a writing sample and permission of instructor. Permit required.

### ENGL 4701 - Being an English Teacher

**Credit Hours:** (3) **Description:** The nature and teaching of English. NOTE: This course does not contribute toward teacher licensure. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

#### ENGL 4900 - Independent Study

**Credit Hours:** (1-3) **Description:** A selected topic or problem in the field of literature, language, or writing. Topic must not duplicate existing University courses. Repeatable May be repeated for maximum of 3 hours credit. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### **ENGL 4995 - Honors Thesis Research**

**Credit Hours:** (3) **Description:** Students engage in individual, intensive study of a unique problem or issue in English Studies, culminating in a prospectus for their Honors thesis. **PREREQUISITE: PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent.

### **ENGL 4996 - Honors Thesis**

**Credit Hours:** (3) **Description:** Students engage in individual, intensive study of a unique problem or issue in English Studies, culminating in a long piece (approx. 40 pages) of scholarly writing. **PREREQUISITE:** ENGL 1010, 1020, and 2201 or 2202 with a "C-" or better, or their equivalent and ENGL 4995.

# **ENVR 4000 - Environ Studies Directed Rsrch**

**Credit Hours:** (3) **Description:** First hand research experience under tutorship of individual faculty member. Students may work individually or in small groups depending upon project. **PREREQUISITE:** permission of instructor. (S/U)

# ENVR 4100-4110 - Biological and Physical Environmental Study

Credit Hours: (3)

### ENVR 4120-4130 - Social and Behavioral Environmental Study

Credit Hours: (3)

#### ESMS 2004 - Intro to Exercise Science

**Credit Hours:** (3) **Former:** (EXSS 2004 ) **Description:** Introduction to education and professional practice; history of ESMS, technology, employment opportunities, certifications and professional organizations.

# ESMS 2015 - Resistance/Aerobic Training Applications

**Credit Hours:** (3) **Description:** Basic theory and practice regarding multiple resistance training and aerobic conditioning modalities. Hands-on experience with resistance training tools that are commonly utilized by professionals working with clients in sport, rehabilitation, and physical conditioning. Free weight, body weight, and machine exercise modalities will be utilized, along with basic resistance exercise programming and instructional methods.

# **ESMS 3020 - Exercise and Sport Mechanics**

Credit Hours: (3) Description: Biomechanical conditions of human movement; knowledge and skills needed to analyze and evaluate human motor performance in order to prescribe appropriate interventions to optimize it. PREREQUISITE: BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021, ESMS 2004, HMSE 2000. PREREQUISITE or COREQUISITE: ESMS 2015

# ESMS 3050 - Advanced Life Support Exercise, Conditioning, Testing

**Credit Hours:** (3) **Former:** EXSS 3050 **Description:** Development of knowledge and skills related to anatomical and physiological changes that may result from exercise conditioning and testing; signs and symptoms of acute health related problems; first aid measures, CPR, use of an AED. **PREREQUISITE:** BIOL 2010/ BIOL 2011 and BIOL 2020/ BIOL 2021, ESMS 2004, HMSE 2000. **PREREQUISITE or COREQUISITE:** ESMS 2015

# ESMS 3405 - Introduction to Structural and Functional Kinesiology

**Credit Hours:** (3) **Description:** Introduction to gross musculoskeletal structure and function as related to purposeful movement of the human body. May not be used as a substitute for ESMS 3410 or ESMS 3415. **PREREQUISITE or COREQUISITE:** ESMS 2004, ESMS 2015, HMSE 2000.

# ESMS 3410 - Anatomical Kinesiology I

**Credit Hours:** (3) **Description:** Study of neuromusculoskeletal systems as they relate to purposeful movement of the lower portion of the human body. Analysis of gross structure and function of the lower body is the primary focus of the course. **PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021. **PREREQUISITE or COREQUISITE:** ESMS 2004, ESMS 2015, and HMSE 2000.

# ESMS 3415 - Anatomical Kinesiology II

**Credit Hours:** (3) **Description:** Study of neuromusculoskeletal systems as they relate to purposeful movement of the upper portion of the human body. Analysis of gross structure and function of the upper body is the primary focus of the course. **PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021. **PREREQUISITE or COREQUISITE:** ESMS 2004 and ESMS 2015; HMSE 2000.

1224

#### ESMS 3450 - Psychological Aspects of Exercise

Credit Hours: (3) Former: EXSS 3450 Description: Emphasis on the application of psychological principles in fostering motivation among individuals in exercise/physical activity settings. (Sp/Su).Offered Spring and Summer. PREREQUISITE: BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021, ESMS 2004. PREREQUISITE or COREQUISITE: ESMS 2015

### ESMS 3502 - Prevention/Care of Athletic Injuries

**Credit Hours:** (3) **Former:** EXSS 3502 **Description:** Practical and theoretical aspects of treatment of athletic injuries in athletic training programs; supplies, training table, therapeutic equipment, and techniques in conditioning and bandaging.

**PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021, ESMS 2004 and HMSE 2000 **PREREQUISITE or COREQUISITE:** ESMS 2015

# ESMS 3603 - Exercise Physiology I

**Credit Hours:** (3) **Former:** EXSS 3603 **Description:** Anatomical and physiological bases for expressing, developing, and maintaining muscular endurance, strength, power, joint flexibility, body composition as well as various factors which may affect them. **PREREQUISITE:** ESMS 2004, ESMS 2015, BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021.

# **ESMS 3700 - Exercise Physiology Introduction**

**Credit Hours:** (3) **Former:** EXSS 3700 **Description:** Acute and chronic physiological adaptations to muscular activity; physiological bases for appropriate training programs for maximizing physical performance.

# ESMS 3703 - Exercise Physiology II

**Credit Hours:** (3) **Former:** (EXSS 3703 ) **Description:** Exercise performance including energy metabolism and regulation, cardiovascular physiology, environmental physiology; principles of physiological and biochemical assessment; interpretation of physiological and biochemical data; development of appropriate training programs to maximize performance efficiency. **PREREQUISITE:** ESMS 2004, BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021. **COREQUISITE:** ESMS 2015

#### ESMS 3803 - Motor Learning

**Credit Hours:** (3) **Former:** (EXSS 3803) **Description:** Theory and research concerning the behavioral and neurological bases for the *l*/ratalog memohis edu/index php

understanding the processes involved in motor skill learning and performance. **PREREQUISITE:** ESMS 2004, ESMS 2015, BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021, HMSE 2000.

#### ESMS 3853 - Motor Behavior

**Credit Hours:** (3) **Former:** (EXSS 3853 ) **Description:** Basic theories and principles of motor learning and performance; developmental aspects of human motor behavior across the lifespan. Offered Spring and Summer. **PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021.

## ESMS 4000 - Exercise Testing Interpretation Lab

**Credit Hours:** (3) **Description:** Acquisition and practice of laboratory/clinical skills pertaining to measurement techniques, tools and interpretation of physical performance and fitness; introduces theoretical and functional techniques of graded exercise testing for functional and/or diagnostic assessment. One lecture hour, four laboratory hours per week. **PREREQUISITE:** BIOL 2010 / BIOL 2011 and BIOL 2020/BIOL 2021; ESMS 2004, ESMS 2015, ESMS 3020, ESMS 3050, ESMS 3410, ESMS 3415, ESMS 3450, ESMS 3603, ESMS 3703, and ESMS 3803; or permission of instructor.

## ESMS 4010 - Supplements/Food/Drugs Health

**Former:** (EXSS 4010) **Description:** Role of nutrition in optimizing performance and training adaptations; macro and micro nutrient intake, proper timing and amount of intake; analysis of validity of proposed ergogenic performance and/or structural adaptation.

**PREREQUISITE:** ESMS 2015 and ESMS 3803; Or permission of instructor.

# ESMS 4015 - Exercise Programs for Special Populations

**Credit Hours:** (3) **Description:** Principles of cardiovascular medicine related to therapeutic management of various disease states through exercise; medical consequences of various disease states; developing comprehensive rehabilitative programs to decrease physical disability.

NOTE: Variable hours of supervised laboratory/field experience may be required. Offered Fall and Summer. **PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021; ESMS 2004, ESMS 2015, ESMS 3050, ESMS 3410, ESMS 3415, ESMS 3450, ESMS 3603, ESMS 3703, ESMS 3803

# **ESMS 4020 - Clinical Biomechanics**

**Credit Hours:** (3) **Description:** This course is an extension of ESMS 3020 with a focus on the clinical applications of biomechanics and musculoskeletal system function. Emphasis will be given to gait pathologies, orthopedic biomechanics, balance and posture, and injury biomechanics. This course is ideal for students who will pursue a career in a clinical field (e.g. physical therapy, medical school.) **PREREQUISITE:** ESMS 2015, ESMS 3020, ESMS 3405, ESMS 3410, and ESMS 3803; or permission of instructor.

**Former:** (EXSS 4406 ) **Description:** Introduction to the methods of conducting ECG and cardiopulmonary exercise testing for asymptomatic and symptomatic populations; ACSM principles of exercise testing as well as methods of ECG interpretation will be covered. NOTE: Variable hours of supervised laboratory/field experience may be required.

# ESMS 4509 - Preparing to Work with Clients with Disabilities

**Credit Hours:** (3) **Description:** People with disabilities include segments of American society that are considered physically, socially, mentally, emotionally, and chronologically abnormal. Emphasis will be placed on examining the needs of these special groups and individuals in health and exercise settings.

## ESMS 4603 - Adv Meth/Strength Conditioning

**Credit Hours:** (3) **Description:** Advanced study of training principles for strength and conditioning programs and their underlying physiological bases. (F/Su). **PREREQUISITE:** BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021; ESMS 2004, ESMS 2015, ESMS 3050, ESMS 3410, ESMS 3415, ESMS 3450, ESMS 3603, ESMS 3703, ESMS 3803; or permission of instructor.

## ESMS 4605 - Internship

**Credit Hours:** (3-6) **Description:** Culminating experience allowing students the opportunity to demonstrate knowledge and skills in an appropriate professional setting. **PREREQUISITE:** Completion of all course work in major and concentration and completion of senior test. (A-F, I) *Cross listing:* HCL 4605; HLSC 4605; NUTR 4605; PETE 4605

# ESMS 4705 - 4711 - Special Topics Workshop in Exercise, Sport and Movement Sciences

**Credit Hours:** (3) **Description:** Selected phases of exercise, sport and movement sciences through group study. In-depth study of area of interest and need for exercise, sport and movement scientists. Repeatable May be repeated with a change in topic.

# ESMS 4902 - 4911 - ESMS 4911 - Special Topics in Exercise, Sport and Movement Sciences

**Credit Hours:** (1-3) **Description:** Current topics in exercise, sport and movement sciences. Repeatable May be repeated with change in topic and content. NOTE: Topics are varied and in online class listings.

## ELC 2900 - Experiential Learning Intermed

**Credit Hours:** (1) **Description:** Systematic process for evaluating and credentialing learning gained in a variery of contexts. Upper/lower-division credit determined by faculty assessor.

## ELC 3900 - Experiential Learning Adv

**Credit Hours:** (1) **Description:** Systematic process for evaluating and credentialing learning gained in a variery of contexts. Upper/lower-division credit determined by faculty assessor.

## ELC 4000 - Community Internship

**Credit Hours:** (1) **Description:** Extensive professional preparation as an intern in a community setting that msy limit student's enrollment in other courses. NOTE: students enrolled in ELC 4000 are considered to be full-time students for enrollment certification purposes. **PREREQUISITE:** PREREQUISITE: permission of student's department chair. (S/U)

## FIR 1220 - Personal Financial Management

**Credit Hours:** (3) **Former:** (2220) **Description:** Non-technical course covering areas of personal budgeting, borrowing and credit, insurance, home ownership, investment, taxes, entrepreneurship, and family financial planning.

## FIR 2811 - Field Experiences in Finance

**Credit Hours:** (3) **Description:** Topics and credit hours will vary. May include field data certification, equity markets, fixed income securities, FX, futures, fixed income, options, swaps or interest rate swaps. Student may earn Bloomberg Certificate.

## FIR 3310 - Real Estate Principles

**Credit Hours:** (3) **Description:** Basic terminology, principles and issues; market analysis, real estate law, instruments, legal descriptions, appraisal, investment, finance, brokerage, property management. Designed for non-real estate majors as well as a foundation for further study.

## FIR 3410 - Financial Management \*\*

**Credit Hours:** (3) **Description:** Fundamentals of financial management; time value of money, identifying financial risk, valuation of bonds and stock, cost of capital and capital budgeting. **PREREQUISITE:** ACCT 2010, ECON 2020, and either SCMS 2710 or MATH 1530.

## FIR 3710 - Investments \*\*

**Credit Hours:** (3) **Description:** Principles of investment in stocks and bonds. Includes fundamental, economic, and technical analyses; measurable and unmeasurable aspects of risk; portfolio management; psychological aspects of the market. **PREREQUISITE:** FIR 3410.

## FIR 3720 - Financial Markets \*\*

**Credit Hours:** (3) **Description:** Survey of important funds markets, institutions and characteristics peculiar to them; sources of supply of

## FIR 3810 - Principles of Risk/Insurance

**Credit Hours:** (3) **Description:** Nature and handling of risk in personal and business situations; emphasis on property, liability and life exposures to loss. Designed for non-insurance major as well as a basis for advanced study.

## FIR 4011 - Retirement and Estate Planning

**Credit Hours:** (3) **Description:** Survey of law of taxation as applied to transmission of property by gift or death and its impact upon accumulations of wealth; estate planning from individual viewpoint designed to create, maintain, and distribute maximum estate possible. **PREREQUISITE:** FIR 3410.

## FIR 4110-4119 - Special Topics

**Credit Hours:** (3) **Description:** Current topics in one of following areas: Finance, Insurance, Real Estate, or Business Law. Topics are varied and in online class listings. Repeatable May be repeated once with change in topic area. **PREREQUISITE:** permission of instructor.

## FIR 4310 - Real Estate Law \*\*

**Credit Hours:** (3) **Description:** Law and legal instruments as applied to real estate; needs of property owners and those engaged in real estate business.

#### FIR 4320 - Real Estate Finance \*\*

**Credit Hours:** (3) **Description:** Terminology, legislation, principles, and analytical techniques pertaining to financing of real estate; perspective of lender, residential borrower, and income property borrower.

## FIR 4331 - Stock Portfolio Mgmt

**Credit Hours:** (3) **Description:** Development and monitoring of investment portfolio by explaining possible investment alternatives; terminology and analysis techniques necessary to fulfill future financial goals. Undergraduate students will assist graduate students in managing a real equity portfolio of \$500,000.

## FIR 4340 - Real Estate Appraisal \*\*

**Credit Hours:** (3) **Description:** Basic terminology, principles, procedures, and issues; nature of value, principles of value, appraisal process, market approach, cost approach, capitalization of income approach, gross rent multiplier approach, and appraisal reports.

## FIR 4350 - Real Estate Investment \*\*

**Credit Hours:** (3) **Description:** Principles and practices reviewed and evaluated; investment strategy, ownership forms, tax implications, cash flow analysis, measures of return, risk management, and property selection.

#### FIR 4440 - Intermediate Managerial Finance \*\*

**Credit Hours:** (3) **Description:** Analytical approaches to firm's financial decisions; current asset management, capital budgeting, cost of capital, capital structure determination, and dividend policy. **PREREQUISITE:** FIR 3410.

## FIR 4550 - International Finance \*\*

**Credit Hours:** (3) **Description:** Financing international trade and investments; foreign exchange markets and exchange rates; balance of payments; current developments in international financial cooperation. **PREREQUISITE:** FIR 3410.

## FIR 4610 - Cases Managerial Finance \*\*

**Credit Hours:** (3) **Description:** Application of tools and principles introduced in previous courses to develop up-to-date problem solving techniques; cases approached from standpoint of top level management and utilize both quantitative and qualitative analysis. **PREREQUISITE:** FIR 3710.

## FIR 4620 - Cases in Financial Planning

**Credit Hours:** (3) **Description:** Case study based capstone course covering aspects of the financial planning process, including ethics, financial planning principles and concepts, investment planning, tax planning, insurance, education planning, retirement planning and estate planning. **PREREQUISITE:** FIR 3710.

## FIR 4710 - Commercial Banking \*\*

**Credit Hours:** (3) **Description:** Study of bank management and bank regulation; examination of conditions and regulations affecting banking decisions; exploration of current theories of profitable bank operations. **PREREQUISITE:** FIR 3410.

# FIR 4720 - Management of Financial Institutions

**Credit Hours:** (3) **Description:** Study of management of institutions considering current economic environments, financial policies, risk management and decision-making worldwide; consistent with existing standards of profitability, liquidity and solvency. **PREREQUISITE:** FIR 3410.

## FIR 4721 - Fixed Income and Derivatives

**Credit Hours:** (3) **Former:** (3770) (Financial Derivative Markets) **Description:** Introduction to fixed income securities, interest rate risk and the structure of debt markets, as well as futures, options, forwards

and swaps (widely used by investment firms and corporations to manage financial risks), with primary emphasis on their practical application. **PREREQUISITE:** FIR 3710.

## FIR 4730 - Financial Analysis/Certification \*\*

**Credit Hours:** (3) **Description:** Preparation for financial market careers; development of personal financial planning and investment portfolio management skills; preparation for CFP and CFA certifications. **PREREQUISITE:** C- or better in FIR 3410.

# FIR 4770 - Security Analysis/Portfolio Management

**Credit Hours:** (3) **Description:** Development of techniques for finding actual worth of securities, primarily stocks and bonds; selection, timing, diversification, and other aspects of supervising investment funds. **PREREQUISITE:** FIR 3710.

## FIR 4810 - Property & Liability Insurance I

**Credit Hours:** (3) **Description:** Forms and functions of fire, marine, automobile, general liability and other types of property and liability insurance; emphasis on business and industrial applications.

## FIR 4820 - Life and Health Insurance

**Credit Hours:** (3) **Description:** Functions of life and health insurance; emphasis on economic security needs, human behavior and the problems related to death and dying; individual life, health and annuity contracts and social insurance; concepts in risk selections and regulation.

## FIR 4870 - Risk Management \*\*

**Credit Hours:** (3) **Description:** Addresses problems faced by risk managers encompassing traditional aspects of risk management and insurance including insurance, reinsurance, hedging and capital markets as tools to manage or mitigate risk. **PREREQUISITE:** FIR 3410.

## FIR 4910 - Independent Study in Finance, Insurance, Real Estate

**Credit Hours:** (1-3) **Description:** Under supervision of faculty members, student will carry on approved research projects in the major area of study. **PREREQUISITE:** senior standing and permission of department chair.

# FIR 4911 - Internship in Finance, Insurance, and Real Estate

**Credit Hours:** (1-6) **Description:** Internship in business organization to gain on-the-job experience in real-life environment. Project to be approved and supervised by department faculty. Credit allowed only after acceptance of report. **PREREQUISITE:** Junior or Senior

standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

## FIR 4996 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research open only to those students enrolled in the honors program. Thesis supervised by area faculty member. **PREREQUISITE:** senior standing and permission of the Director of the College Honors Program.

## FREN 1010 - Elementary French I\*\*

**Credit Hours:** (3) **Description:** Basic skills fundamental to language proficiency and culture.

## FREN 1020 - Elementary French II\*\*

**Credit Hours:** (3) **Description:** Further development of basic skills fundamental to language proficiency and culture. **PREREQUISITE:** FREN 1010, or equivalent.

## FREN 2010 - Intermediate French I

**Credit Hours:** (3) **Description:** Comprehensive review of French grammar, exercises in writing, and readings in French literature and culture. **PREREQUISITE:** FREN 1020, or equivalent.

#### FREN 2020 - Intermediate French II

**Credit Hours:** (3) **Description:** More advanced readings. **PREREQUISITE:** FREN 2010, or equivalent.

#### FREN 3301 - Conversation and Composition I

**Credit Hours:** (3) **Description:** Development of advanced conversational and written proficiency. **PREREQUISITE:** FREN 2020, or equivalent.

#### FREN 3302 - Conversation and Composition II

**Credit Hours:** (3) **Description:** Continued development of advanced conversational and written proficiency. **PREREQUISITE:** FREN 3301, or permission of instructor.

## FREN 3401 - French Civilization

**Credit Hours:** (3) **Description:** Culture of France as reflected in its history, social institutions, art, and music. **PREREQUISITE:** FREN 3301, or permission of instructor. Recommended Recommended for Foreign Language, liberal arts, and International Business majors.

## FREN 3402 - France and the Francophone World

1228 Credit Hours: (3) Description: Major institutions and cultural aspects of France and the French-speaking world. PREREQUISITE: FREN 3301

## FREN 3791 - French for Commerce I

**Credit Hours:** (3) **Description:** Introduction to French business terminology and forms of correspondence with regular readings of business, commercial and technical publications. **PREREQUISITE:** FREN 3301 recommended.

## FREN 3900 - French Culture and Society

**Credit Hours:** (3-6) **Description:** Intensive language and culture; travel to a French speaking country required. **PREREQUISITE:** permission of study abroad director.

## FREN 4302 - Adv French Grammar

**Credit Hours:** (3) **Description:** Practical advanced grammar course concerned with grammatical, syntactical, and lexical usage of contemporary French. **PREREQUISITE:** FREN 3302, or equivalent.

## FREN 4307 - French Lit & Civ to 1789

**Credit Hours:** (3) **Description:** A survey of French literature and civilization from the Middle Ages to the Revolution. **PREREQUISITE:** FREN 3302, or permission of instructor.

## FREN 4308 - French Lit & Civ 1789-present

**Credit Hours:** (3) **Description:** A survey of French social and cultural history and literature from the beginning of the French Revolution through the present. **PREREQUISITE:** FREN 3302, or permission of instructor.

#### **FREN 4310 - French Translation**

**Credit Hours:** (3) **Description:** An introduction to translation, focusing on practical applications and techniques for translating a variety of text types and authentic documents. **PREREQUISITE:** FREN 3301, or permission of instructor.

## FREN 4415 - Francophone Literature

**Credit Hours:** (3) **Description:** Study of literature written in French from countries other than France. Repeatable May be repeated for a maximum of 6 hours credit with a change in content and permission of instructor.

## FREN 4780 - Individual Study French

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of French chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# FREN 4791-4799 - Special Topics in French Literature, Language, or Civilization

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** FREN 3301, or permission of instructor. Recommended RECOMMENDED: FREN 3411.

## FREN 4801 - Cont France/Francophone World

**Credit Hours:** (3) **Description:** Overview of major institutions and cultural aspects of contemporary France and the French-speaking world. **PREREQUISITE:** FREN 3301 or permission of instructor.

## GERM 701 - German Rdng Knwldge I

Credit Hours: (3)

## **GERM 1010 - Elementary German I**

**Credit Hours:** (3) **Description:** Basic skills fundamental to language proficiency and culture.

## **GERM 1020 - Elementary German II**

**Credit Hours:** (3) **Description:** Further development of basic skills fundamental to language proficiency and culture. **PREREQUISITE:** GERM 1010, or equivalent.

## **GERM 2010 - Intermediate German I**

**Credit Hours:** (3) **Description:** Continued development of listening, speaking, reading, and writing skills. **PREREQUISITE:** GERM 1020, or equivalent.

## **GERM 2020 - Intermediate German II**

**Credit Hours:** (3) **Description:** Expansion of German skills, with more extensive listening comprehension practice and readings. **PREREQUISITE:** GERM 2010, or equivalent.

## **GERM 3301 - Conversation and Composition I**

**Credit Hours:** (3) **Description:** Development of advanced conversational and written proficiency. Repeatable May be repeated for a maximum of 6 hours credit with permission of department. **PREREQUISITE:** GERM 2020, or equivalent.

## **GERM 3302 - Conversation and Composition II**

**Credit Hours:** (3) **Description:** Continued development of advanced conversational and written proficiency. Repeatable May be repeated for a maximum of 6 hours credit with permission of department. **PREREQUISITE:** GERM 2020, or equivalent.

#### **GERM 3303 - German Translation**

**Credit Hours:** (3) **Description:** Combination of historical review of translation theories with translation practice; translation of German to English as well as English to German; how translations reflect changing literary and cultural values and tastes; examination how nuances of language and culture (source and target) influence the translator's choice of whom and what kind of text to translate. **PREREQUISITE:** GERM 2020 or permission of instructor.

## **GERM 3411 - Intro German Lit and Culture I**

**Credit Hours:** (3) **Description:** German literature from 17th to 18th century. **PREREQUISITE:** GERM 2020, or equivalent.

## **GERM 3412 - Intro Germ Lit and Culture II**

**Credit Hours:** (3) **Description:** German literature from 19th to 21st century. **PREREQUISITE:** GERM 2020, or equivalent.

## **GERM 3790 - Advanced German Grammar**

**Credit Hours:** (3) **Former:** (Was 4302) **Description:** Special problems in grammar; recommended for majors and minors. **PREREQUISITE:** 3000 level German course or equivalent.

#### **GERM 3791 - Business German I**

**Credit Hours:** (3) **Description:** German economy and society; German business terminology and forms of communication. **PREREQUISITE:** GERM 2020, or equivalent.

#### **GERM 3792 - Business German II**

**Credit Hours:** (3) **Description:** German economy and global market. German business terminology and forms of communication. **PREREQUISITE:** GERM 2020, or equivalent.

## **GERM 3900 - Germany Today**

**Credit Hours:** (3-6) **Description:** Intensive language and culture course; travel to German speaking country required. **PREREQUISITE:** permission of study abroad director.

## GERM 4443 - German Writers 20th Century

**Credit Hours:** (3) **Description:** Selected works of Hesse, Thomas Mann, Kafka, Frisch, Duerrenmatt, Brecht, and Boell. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

## **GERM 4451 - German Drama**

**Credit Hours:** (3) **Description:** Survey of dramatic literature from sixteenth to twentieth centuries; readings from Reformation, Baroque, Enlightenment, Sturm und Drang, Classicism, Romanticism, Realism, and modern period. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

The online catalog can be accessed at http://catalog.memphis.edu/index.php

#### **GERM 4465 - German Narrative Prose**

**Credit Hours:** (3) **Description:** Reading of major prose writings from Romanticism to present; emphasis on the Novelle. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

#### **GERM 4466 - German Poetry**

**Credit Hours:** (3) **Description:** Overview of German poetry since 1600; emphasis on sociohistorical aspects, formal and structural analysis of selected works. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

#### GERM 4480 - Goethe

**Credit Hours:** (3) **Description:** Special emphasis on early and late poetry, Die Leiden des jungen Werthers, and Faust, part I. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

#### **GERM 4501 - Teaching German Pedagogy**

**Credit Hours:** (3) **Description:** Application of modern linguistic theories to learning German. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

#### GERM 4511 - German Lang Dev/Structure

**Credit Hours:** (3) **Description:** German language in its various stages of development. **PREREQUISITE:** two 3000-level German courses, or permission of instructor.

#### **GERM 4780 - Individ Study German**

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of German chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit by permission of chair. **PREREQUISITE:** permission of instructor.

## GERM 4791-4799 - Special Topics in German Language or Literature

**Credit Hours:** (3) Repeatable May be repeated for maximum of 6 hours credit. **PREREQUISITE:** two courses from: GERM 3301, GERM 3302, GERM 3411, GERM 3412, or permission of instructor.

#### HADM 4101 - Health Systems

**Credit Hours:** (3) **Description:** Analysis of health and medical care systems with reference to public, private and voluntary agencies at local, state, regional, and national levels; orients administrators to health and medical care systems with which they may work. **PREREQUISITE:** junior or senior standing.

HMSE 1100 - Concepts Fitness/Wellness

1230 **Credit Hours:** (2) **Description:** Emphasis on individual responsibility for achieving optimal well-being and preventive health practices that promote healthful lifestyles and reduce risk factors.

#### HMSE 2000 - Health/Sport Sc Terminology

**Credit Hours:** (2) **Description:** Foundations of medical language with specific emphasis on terminology and nomenclature for health and sport sciences.

#### HMSE 2007 - Careers in Health Studies

**Credit Hours:** (1) **Description:** Overview of career options in the broad field of health studies, with a focus on career paths for students majoring in dietetics/nutrition, exercise science, health sciences, healthcare leadership, physical education, and related areas. Weekly presentations provided by professionals working in the allied health sciences.

#### HMSE 2102 - ARC First Aid and CPR

**Credit Hours:** (3) **Description:** Safety skills and techniques of immediate and temporary care in the event of injury or sudden illness. Includes necessary training and skill for CPR certification. Successful completion qualifies the student for First Aid certificate endorsed by the American Red Cross. This course may be taken to improve the grade for one, but not both, of the former courses.

#### HMSE 2103 - AHA First Aid and CPR

**Credit Hours:** 3 **Description:** Safety Skills and techniques of immediate and temporary care in the event of injury or sudden illness. Includes necessary training and skill for CPR certification. Successful completion qualifies the student for First Aid certificate endorsed by American Heart Association

# HMSE 4007 - Professional Development in Health Studies

**Credit Hours:** (1) **Description:** Students acquire or refine professional skills necessary to excel in internship placements, graduate studies, and/or future employment opportunities. **PREREQUISITE:** Students must have successfully completed at least 60 credit hours of academic coursework, with a minimum GPA of 2.0. This course is best taken during the junior or senior year, prior to internship or seeking employment. *Cross listing:* N/A

#### HMSE 4105 - Prep/Work w/Clients w/Dis

**Credit Hours:** (3) **Description:** People with disabilities includes segments of American society that are considered physically, socially, mentally, emotionally, and chronologically abnormal. Emphasis will be placed on examining the needs of these special groups in health and exercise settings.

## HMSE 4305 - Problems/Health Sport Science

**Credit Hours:** (1-3) **Description:** Independent study and/or research project on human movement science problem, issue, or concern. (S/U) **PREREQUISITE:** permission of instructor and coordinator of undergraduate studies.

#### HMSE 4999 - Senior Project/HSS \*\*

**Credit Hours:** (3) **Description:** Integrative study that culminates in discipline-specific research, service-learning, or international study tour. Professional level paper and presentation of work required. Completion of the Senior Test in respective major required. **PREREQUISITE:** all other course work, excluding internship, must be completed. **COREQUISITE:** NUTR 4605.

## HCL 3000 - Healthcare Leadership \*\*

**Credit Hours:** (3) **Description:** Healthcare leadership and management principles in the health care environment; overview of organization, leadership, management, and change theories; planning, decision making, and effects of environment, technology, and human behavior in an organization.

## HCL 3010 - Healthcare Financial Mgmt \*\*

**Credit Hours:** (3) **Description:** Financial management of healthcare systems and delivery of quality of care including operating budgets and capital budgets; fundamentals of budgetary development, analysis, cost/benefit analysis; investments; revenue; payment systems; examination of cash flow, market analysis, financial statement.

#### HCL 3020 - Healthcare Informatics \*\*

**Credit Hours:** (3) **Description:** Background and overview of the analysis, design, evaluation, selection, installation, use, and management of information systems in health care settings; review of information management function and value and limitations of information; role of information technology in the provision of quality care and management decision making; details on computer hardware, software, networking, and telecommunications.

## HCL 3030 - Healthcare Strategic Plan/Mktg \*\*

**Credit Hours:** (3) **Description:** Steps to ensure the viable future of an organization, considering the present and future environment in which it operates, as well as identifying its internal strengths and weaknesses, external expectations, and future opportunities and threats. The resultant plan is a document outlining future directions and strategies. A corollary strategy of marketing must be designed to include pricing of services, communication, advertising and promotion, distribution channels, and client/patient motivation and services.

#### HCL 3040 - U S Health System \*\*

**Credit Hours:** (3) **Description:** Overview and developmental summary of the American health care system and its key elements; types of organizations; financing mechanisms; major industry

1231 stakeholders; professional groups and workforce issues; public health and government organizations.

#### HCL 3050 - Prof Writing Healthcare \*\*

**Credit Hours:** (3) **Description:** Writing, critical thinking, and analysis relevant to the health-related issues and its impact on healthcare leadership; basic principles of presentation styles, professional business transmissions, and writing concepts are provided as it relates to healthcare leadership.

#### HCL 3060 - Interpersonal Skills

**Credit Hours:** (3) **Description:** Classroom lectures and role-playing scenarios with pertinent journal articles assigned prior to each class meeting. Course is for students in healthcare programs such as nursing and health sciences who will interact with patients, families, peers and supervisors in healthcare settings.

#### HCL 4000 - Health Policy Issues \*\*

**Credit Hours:** (3) **Description:** Explores the legislative process for healthcare policies and its influence on delivery of quality patient-centered care; historical overview of healthcare inequities are addressed and their impact on the healthcare environment; examination of professional advocacy is introduced to assist student with clarity and an understanding of how to navigate the political landscape as it related to healthcare leadership.

#### HCL 4010 - Healthcare Stats/Research \*\*

**Credit Hours:** (3) **Description:** Principles and application of statistical methods as it relates to healthcare issues; investigational approaches and techniques are introduced to enhance the student's understanding of research and the translational scientific process of the healthcare environment.

#### HCL 4020 - Law/Ethics of Healthcare \*\*

**Credit Hours:** (3) **Description:** Introduction to compliance, government regulations, and the legal aspects of the healthcare environment; principles and theories of ethics and ethical decision making; ethical fitness for innovative healthcare leaders.

## HCL 4030 - Healthcare Human Resources \*\*

**Credit Hours:** (3) **Description:** Introduction to human resources management in health care organizations; fundamental human resources functions; recruiting and selection, training and development, performance management, compensation and retention; review of legal and regulatory environment of human resources management; participation of human resources management in supporting an organization's strategic priorities and goals.

#### HCL 4040 - Business Principles/Healthcare \*\*

**Credit Hours:** (3) **Description:** Principles of microeconomics and their application to healthcare; demand and supply model; theoretical model of competition, opportunity costs, production of health; cost benefit and cost effectiveness analysis; behavior of health care markets and organizations; role of government in health and medical care markets; review of current health care reforms.

## HCL 4605 - Internship \*\*

**Credit Hours:** (3-6) **Description:** Field Experience allowing students the opportunity to demonstrate knowledge and skills in an appropriate professional setting based upon their training and experience. (S/U) *Cross listing:* ESMS 4605; HLSC 4605; NUTR 4605; PETE 4605

#### HETH 4210 - Healthcare Research Methods\*\*

**Credit Hours:** (3)

## HETH 4211 - Comm Healtcare Lead/Mgmt\*\*

Credit Hours: (3)

## HETH 4213 - Community Health/Iss/Serv\*\*

Credit Hours: (3)

## HLSC 2100 - Wellness Concepts Practice\*\*

**Credit Hours:** (3) **Former:** HPRO 2100 **Description:** Individual responsibility for achieving optimal well-being through preventive health practices that promote healthful lifestyles.

# HLSC 2200 - Introduction to Public Health & Health Sciences

**Credit Hours:** (3) **Former:** HPRO 2200 **Description:** Foundations of public health and health sciences; role of health promotion practice in schools, community, work site, and health care settings; emphasis on determinants of health behavior and prevention intervention approaches.

## HLSC 3000 - Introduction to Medical Assisting

**Credit Hours:** (3) **Description:** Introduction to medical assisting and medical office administration within the healthcare team. Topics such as legal and ethical considerations affecting the medical assistant, safety, medical emergencies, basic pharmacology, nutritional requirements, and rehabilitation procedures will be explored. **PREREQUISITE:** BIOL 2010/2011, BIOL 2020/2021, HMSE 2000

# HLSC 3001 - Laboratory Techniques in Medical Assisting

**Credit Hours:** (4) **Description:** Instruction in basic laboratory techniques and clinical exam room procedures used by the medical assistant. Topics include vital signs, EKGs, preparing and administering medications, collecting and processing specimens, phlebotomy and related topics. **PREREQUISITE:** BIOL 2010/2011, BIOL 2020/2021, HMSE 2000

1232

# HLSC 3002 - Patient Interaction in Medical Assisting

Credit Hours: (3) Description: Concepts of Medical Assistant-patient interactions through written, verbal and electronic forms of communication. Students will explore topics such as active listening, nonverbal communication, therapeutic communication, fundamental writing skills, proper telephone etiquette and related topics. PREREQUISITE: BIOL 2010 /BIOL 2011 ,BIOL 2020 /BIOL 2021 ,HMSE 2000

## HLSC 3003 - Medical Office Administration

**Credit Hours:** (3) **Description:** Introduction to medical office administration responsibilities for Medical Assistants. Topics such as medical coding and billing, health insurance, medical record management, and patient scheduling will be covered. **PREREQUISITE:** BIOL 2010/2011, BIOL2020/2021 and HMSE 2000.

## HLSC 3004 - Medical Assisting Certification Review Preparation

Credit Hours: (1) Description: A review of concepts for students preparing to take the Medical Assisting certification examination. PREREQUISITE: BIOL 2010 /BIOL 2011, BIOL 2020 /BIOL 2021, HMSE 2000, HLSC 3000, HLSC 3001, HLSC 3002, and HLSC 3003

# HLSC 3306 - Elementary School Health and Wellness

**Credit Hours:** (2) **Former:** HPRO 3306 **Description:** Basic health knowledge and skills essential toward enhancing health lifestyle among elementary school children; integration of wellness concepts and practices in all other subject disciplines of school curriculum; developing strategies for successful K-6 health and wellness instruction.

## HLSC 3500 - Crit Topics/Healthy Behavior

#### Credit Hours: (3) Former: (HPRO 3500)

Formerly Healthy Habits/ Personal Wellness **Description:** Behavioral skill building to encourage healthy lifestyle including healthy eating and physical activity choices that enables individuals to improve health and prevent disease. **PREREQUISITE:** HLSC 2100

# HLSC 3505 - Prin/Health Fitness Instruc

**Credit Hours:** (3) **Former:** HPRO 3505 **Description:** Principles of exercise prescription and leadership; principles of writing exercise prescriptions based on case studies for apparently health and medically stable asymptomatic populations; calculation of energy expenditure; health related effects of physical activity; leading exercise groups and individuals. (Sp/Su). **PREREQUISITE:** HLSC 2100, BIOL 2010/BIOL 2011 and BIOL 2020/BIOL 2021.

## HLSC 3506 - Principles of Health/Fitness Practicum

**Credit Hours:** (1) **Former:** HPRO 3506 **Description:** Acquisition and practice of laboratory/clinical skills pertaining to methods for measuring body composition, muscle strength, muscle endurance, flexibility, aerobic endurance.

## HLSC 3522 - Assessment and Program Evaluation in Health Sciences (HSCI)

**Credit Hours:** (3) **Former:** HPRO 3522 **Description:** Concepts of program evaluation as it applies to health; types of needs assessment, formative research, process evaluation, monitoring of outputs and outcomes, impact assessment, cost analysis. Offered Fall and Summer.

# HLSC 3606 - Leadership and Communication in Health Sciences

**Credit Hours:** (3) **Former:** HPRO 3606 **Description:** Concepts, models, tools associated with health promotion communication and leadership styles, practices, theories; application to real life health problems and issues in development of health promotion careers. Offered Spring and Summer.

# HLSC 3716 - Marketing and Entrepreneurship in Health Sciences

**Credit Hours:** (3) **Former:** HPRO 3716 **Description:** Strategies applicable to health promotion programs in both "for-profit" and "not-for-profit" organizations; critical processes and mechanisms for social marketing and social entrepreneurship and traditional capital ventures. Offered Spring and Summer.

# HLSC 3800 - Strategic Planning & Program Development

**Credit Hours:** (3) **Former:** HPRO 3800 **Description:** Basic skills and principles of planning, developing, implementing, and evaluating health promotion programs in a variety of settings including community, business, and corporate sectors. (F/Su). **PREREQUISITE:** BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021.

# HLSC 4100 - Health and Aging

**Credit Hours:** (3) **Former:** HPRO 4100 **Description:** Concepts and practice in process of aging and its implications for individuals, families, and society. Offered Fall and Summer.

#### 1233 HLSC 4200 - Cultural Competence in Health

**Credit Hours:** (3) **Former:** HPRO 4200 **Description:** Concept of culture as framework toward understanding health behavior and the implications of culture for health, disease occurrence, prevention, and intervention approaches. Offered Fall and Summer.

# HLSC 4300 - Individuals with Disabilities and Special Needs

**Credit Hours:** (3) **Former:** HPRO 4300 **Description:** Through this course, students will increase awareness and understanding of health promotion for individuals with disabilities or other individuals with clinical special needs. Topics may include exercise recommendations for various special populations, Americans with Disabilities Act requirements, communication strategies and program modification.

# HLSC 4400 - Statistics for Health Sciences

**Credit Hours:** (3) **Former:** HPRO 4400 **Description:** Utilization and interpretation of statistical methods applied to health; topics include frequency distributions, central tendency, variability correlation, linear regression, introduction to probability, normal distribution, interval estimation, hypothesis testing via t-test and chi-square and computer utilization in statistical analysis.

# HLSC 4500 - Project Management in Health Sciences

**Credit Hours:** (3) **Former:** HPRO 4500 **Description:** Concepts and practice launching and leading successful programs, campaigns and/or initiatives including planning, implementation, management (time, risk, financial) and quality assurance.

# HLSC 4520 - Health and Lifestyle Counseling

**Credit Hours:** (3) **Former:** HPRO 4520 **Description:** Counseling techniques and application to develop and apply basic counseling, lifestyle coaching skills, helping attitudes in health promotion. Offered Fall and Summer.

# HLSC 4530 - Epidemiology \*\*

**Credit Hours:** (3) **Former:** HPRO 4530 **Description:** Key basic epidemiologic concepts and methods, as well as the scope and application of the tenets of epidemiology in health promotion and related fields. The nature of the course involves cooperative group learning exercises.

# HLSC 4605 - Internship

**Credit Hours:** (6-9) **Former:** HPRO 4605 **Description:** Culminating experience allowing students the opportunity to demonstrate knowledge and skills in an appropriate professional setting. **PREREQUISITE:** Completion of all course work in major and concentration, proof of

current First Aid, AED, and CPR certification. (S/U) *Cross listing:* HCL 4605; ESMS 4605; NUTR 4605; PETE 4605

## HEBR 1010 - Elementary Hebrew I

**Credit Hours:** (3) **Description:** Principles of pronunciation; everyday expressions: basic sentence patterns through oral practice, writing and reading.

#### HEBR 1020 - Elementary Hebrew II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** HEBR 1010, or equivalent.

#### HEBR 2010 - Intermediate Hebrew I

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** HEBR 1020, or equivalent.

#### HEBR 2020 - Intermediate Hebrew II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** HEBR 2010, or equivalent.

## HIST 1110 - World History to 1500\*\*

**Credit Hours:** (3) **Description:** Traces forms of civilization from 1500 to present. **[G]** 

High Impact Practice Code: Learning Community

#### HIST 1120 - World History since 1500\*\*

**Credit Hours:** (3) **Description:** Traces forms of civilization from 1500 to present. **[G]** 

High Impact Practice Code: Study Abroad

#### HIST 2010 - U S to 1877

**Credit Hours:** (3) **Description:** United States from colonization through Reconstruction. **[G]** 

#### HIST 2020 - The U S Since 1877\*\*

**Credit Hours:** (3) **Description:** United States from 1877 to present. **[G]** 

High Impact Practice Code: Study Abroad

HIST 2030 - Tennessee History\*\*

**Credit Hours:** (3) **Former:** (3900) **Description:** Political, economic, and social development of Tennessee from earliest times. **[G]** 

1234

## HIST 3000-3009 - Special Topics in History

**Credit Hours:** (1-3) **Description:** Intensive study of selected topics; topic announced in online class listing.

## HIST 3035 - Technology/Culture Am History\*\*

**Credit Hours:** (3) **Description:** Interrelationship between technology and culture; emphasis on 19th and early 20th centuries.

#### HIST 3211 - Latin American History to 1808

**Credit Hours:** (3) **Description:** Political, economic, social and cultural development in Latin America from pre-conquest era to 1808.

#### HIST 3212 - Latin American History since 1808

**Credit Hours:** (3) **Description:** Major political, economic, and social trends in Latin America since 1808; emphasis on Argentina, Brazil, Chile, and Mexico.

## HIST 3273 - Islamic History to 1405

**Credit Hours:** (3) **Description:** Survey of religious, social, political, intellectual, and cultural developments in Muslim communities from the 7th century until the death of Timur in 1405. Geographical focus is the Midlle East, Asia, and Africa.

#### HIST 3274 - Islamic History since 1405

**Credit Hours:** (3) **Description:** Survey of religious, social, political, intellectual, and cultural developments in Muslim communities from the death of Timur in 1405 to the 21st century. Focus is mainly on the Middle East, Asia, and Africa, with some attention to the emergence of Muslim communities in Europe and the Americas.

## HIST 3275 - History of Jewish People

**Credit Hours:** (3) **Description:** History of Jewish people from antiquity to present; emphasis on their changing relationships to larger cultures in which they participated.

#### HIST 3281 - History/Africa to 1500

**Credit Hours:** (3) **Description:** Human origins to the beginnings of African-European Atlantic trade in the 15th century; gatheringhunting societies; agriculture and technology; early African civilizations; classical age kingdoms and empires; Christianity, Islam, African religions; Indian Ocean world; Trans-Saharan trade network. NOTE: students who have earned credit for HIST 3280 may not receive credit for HIST 3281.

## HIST 3282 - History of Africa since 1500

**Credit Hours:** (3) **Description:** Origins of Atlantic era to present; African-European trade; slavery and slave trade; African Diaspora; kingdoms and empires; European settlement and apartheid in South Africa; economic and political changes of the 19th century; European colonial occupation; struggle for independence; Africa today. NOTE: students who have earned credit for HIST 3280 may not receive credit for HIST 3282.

#### HIST 3290 - Traditional East Asia \*\*

**Credit Hours:** (3) **Description:** Comparative survey of civilizations in India, China, Japan, and Southeast Asia, from their beginnings through the 18th century.

#### HIST 3291 - Modern Asia

**Credit Hours:** (3) **Description:** Asia from 1800 to present, focusing on Asian reactions to colonialism, and rise of modern nation states in India, Japan, China, and Southeast Asia.

## HIST 3301 - Early Modern Europe, 1450-1815

**Credit Hours:** (3) **Description:** Surveys the history of Europe from the Renaissance to the French Revolution. Topics include the transformation of European kingdoms into powerful centralized states with global empires; the European Reformation and religious wars; the rise of print culture; the Scientific Revolution; the Enlightenment; and the Industrial Revolution.

#### HIST 3302 - Modern Europe 1800-Present \*\*

**Credit Hours:** (3) **Description:** Surveys the major political, social, economic, and cultural forces that have shaped Modern Europe. Topics include the French, Agricultural, and Industrial Revolutions, imperialism, the Russian Revolution, communism, and fascism, the two world wars, the Holocaust, and the rise and fall of the Cold War.

#### HIST 3320 - Ancient World \*\*

**Credit Hours:** (3) **Description:** Survey of civilizations of ancient Egypt and the Near East, Greece, and Rome.

#### HIST 3370 - Medieval Europe

**Credit Hours:** (3) **Description:** Surveys the history of Europe and the Mediterranean from the collapse of the Roman Empire c. 500 to the Black Death c. 1500. Traces the rise of Christianity and Islam, the development of post-classical states like those of Charlemagne and William the Conqueror, and the reorientation of the region's economic and cultural structures.

#### HIST 3670 - Civil War/Reconstruction\*\*

1235 **Credit Hours:** (3) **Former:** (4670) **Description:** Examines the political, economic, and other circumstances that let to the U.S. Civil War; military aspects of the war; postwar Reconstruction period, with particular emphasis on the consequences of slave emancipation.

#### HIST 3803 - American Diplomatic History \*\*

**Credit Hours:** (3) **Description:** Though including the 18th and 19th centuries, course concentrates on 20th century; emphasizes relationship between foreign policy and domestic forces.

#### HIST 3811 - U S Military/Naval History\*\*

**Credit Hours:** (3) **Description:** Developments since colonial period; emphasis on background and growth of national military and naval establishments, military and naval thought, difficulties accompanying modernization and assumption of global responsibilities, and problem of relationship between civilian and military-naval sectors in democracy.

#### HIST 3815 - World War II

**Credit Hours:** (3) **Description:** Broad overview of origins, principal campaigns, and effects of World War II with some attention to domestic considerations; legacy of Great War, blitzkrieg, invasion of Europe, Pearl Harbor, Battle of Midway, defeat of Germany and Japan, and domestic impact of the war.

## HIST 3823 - Economic History of U S

**Credit Hours:** (3)

## HIST 3840 - U S Constitutional History

**Credit Hours:** (3) **Description:** Constitutional developments from colonial period to present, emphasis on English heritage, constitutional antecedents of revolutionary era, origins and growth of federal system under Constitution of 1787, and evolution of modern constitutional government in United States.

## HIST 3863 - American Ideas and Culture

**Credit Hours:** (3) **Description:** Survey of way Americans have thought about essential features of social and political order; development of and debate over central ideas of equality, freedom, and individualism that have defined the order of the common life. **[G]** 

#### HIST 3881 - African American History \*\*

**Credit Hours:** (3) **Former:** (4881) **Description:** History and culture of African Americans in light of their experiences; aspects of African American life and attitudes of dominant society within which African Americans lived; ways African American men and women shaped and nurtured their own lives, culture and history in U.S. **[G]** 

#### HIST 3905 - History of Memphis The online catalog can be accessed at http://catalog.memphis.edu/index.php

**Credit Hours:** (3) **Description:** Political, social and economic aspects of development of Memphis from foundation to present.

#### HIST 3920 - The South to 1865

**Credit Hours:** (3) **Description:** The US South from the colonial period to the end of the Civil War

#### HIST 3930 - The South since 1865

Credit Hours: (3) Description: South from Civil War to present.

## HIST 3941 - North American First Peoples

Credit Hours: (3) Former: HIST 4941- History of American Indian

#### **Description:**

This course will synthesize the histories of North American first peoples from pre-Columbian periods to the present day. Select topics may include tribal social, political, and economic patterns, spirituality and worldviews, inter- and intra-tribal relations, gender relations, contact and exchange, imperialism, governmental Indian policies, "Indianness," and Native Americans in contemporary society. The course will pay particular attention the intersection of ethnicities and cultures in early North American history.

#### HIST 4012 - Directed Reading/Honors \*\*

**Credit Hours:** (3) **Description:** Under the direction of faculty member, student reads about particular topic or topics. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** admission to Honors Program.

#### HIST 4014 - Directed Readings \*\*

**Credit Hours:** (1-3) **Description:** Readings on particular topic in history under supervision of member of faculty.

#### HIST 4020 - Internship in History

**Credit Hours:** (1-12) **Description:** Supervised internships working with various governmental agencies, private foundations or businesses of interest to historians. Repeatable May be repeated for up to 12 hours credit, of which no more than 6 hours may be counted toward the satisfaction of major requirements. **PREREQUISITE:** permission of department. (S/U/I)

#### HIST 4021 - U.S. Sport History

**Credit Hours:** (3) **Description:** This course examines the history of sports in the United States. It seeks to connect how Americans played and consumed sports to larger themes that define the nation's experience. Topics will include the role of the sporting landscape upon the emergence of the United States as an international power; profound transformations in race, class, gender, and sexuality; economic and corporate growth; and regional variations and traditions.

**Credit Hours:** (3) **Description:** Applied history, covering oral history theory, research, and interviewing procedures.

#### HIST 4050-4069 - Special Topics in History

**Credit Hours:** (1-3) **Description:** Intensive study of selected topics; topic announced in online class listing.

#### HIST 4070 - Conspiracy Theories in America

**Credit Hours:** (3) **Description:** This course focuses on conspiracy theories in American history from the Revolutionary Era to the present. The course examines the fallacious logic behind such theories, the social and political functions they serve for their believers, and the reasons why they arise regularly in the American context.

## HIST 4071 - History of the Caribbean

**Credit Hours:** (3) **Description:** Introduction to the social, economic, political, and cultural history of the Caribbean. Major themes and events studied include European conquest and colonization after 1492; transatlantic slavery and plantation societies in the 17th and 18th centuries; revolution and nation-building beginning in the late 18th century; 20th century decolonizations; and contemporary issues of migration and globalization. NOTE: Students who have earned credit for HIST 3233 may not receive credit for HIST 4071.

## HIST 4101 - Early Modern Britain, 1485-1815

**Credit Hours:** (3) **Description:** At the end of the fifteenth century Britain was a "comparatively minor power whether judged in military or wider political terms." Yet, in just three hundred years, it became a global superpower, possessed of "the most advanced and dynamic economy, the soundest and strongest financial base, and formidable naval might," as the historian E.A. Wrigley put it. In this course we will consider why and how Britain transformed from a European backwater into one of the world's leading powers between 1485 and 1815. We will explore the sweeping political, social, religious, and economic changes that fueled that transformation, from the creation of the Tudor monarchy and the Reformation to the Glorious Revolution and the rise of party politics to the American Revolution, abolition, and the French Revolutionary wars. NOTE: Students who have earned credit for HIST 3121 may not receive credit for HIST 4101.

#### HIST 4102 - Modern Britain, 1815 to the Present

**Credit Hours:** (3) **Description:** In this course we will explore Britain's rise and fall as a global superpower between 1815 and the present day. We will consider the making and unmaking of the British empire; British humanitarianism at home and abroad; the expansion of the franchise and the development of democratic politics in Britain; the creation of the British welfare state; Britain's role in the post-World War II order; and how Britain's past as a great imperial power is being remembered now, in the era of Brexit. NOTE: Students who have earned credit for HIST 3122 may not receive credit for HIST 4102. **[G]** 

## HIST 4105 - War in the Ancient World

**Credit Hours:** (3) **Description:** Development of warfare from 2000 BCE to 1200 CE, from Bronze Age to Mongol conquests; emphasis on Greek and Roman warfare; tactics, methods, strategies; theories of war and their historical development; attention to relationships between cultures, technology, influence of culture on war and war on society.

#### HIST 4106 - War in the Modern World

**Credit Hours:** (3) **Description:** Development of warfare from 1400 to the present; tactics, methods, and strategies; theories of war and their historical development with particular attention to relationships between cultures, changing technology, and the manner in which war has been conducted; purposes for which wars are fought.

## HIST 4145 - History of Modern Germany

**Credit Hours:** (3) **Description:** Germany from the Enlightenment to the present day. Topics include the Napoleonic era and its aftermath, 1848, German unification, socialism, nationalism, antisemitism, World War I, the Weimar Republic, the Third Reich, post-war liberal-democratic West Germany and communist East, and today's reunified Germany at the heart of the European Union.

## HIST 4151 - Hapsburg Central Europe 1740-1918

**Credit Hours:** (3) **Description:** The Habsburg Monarchy brought relative stability to a region that has since experienced ethnic cleansing, mass murder, and dictatorship. Starts with the Habsburg dynasty's efforts to centralize its authority and ends with WWI, which led to the collapse of the Monarchy and redrawing the borders of east central Europe.

#### HIST 4160 - Russia to 1917

**Credit Hours:** (3) **Description:** Detailed study of Russia from earliest times to 1917. Major themes include the multiethnic nature of Russia as a Eurasian country, the rise of serfdom and autocracy, expansion into Eastern Europe, Siberia and Central Asia, Russian Orthodoxy, 19th-century modernization challenges, the evolution of a revolutionary movement, and the collapse of the Romanov dynasty in 1917.

#### HIST 4161 - Socialism: A History

**Credit Hours:** (3) **Description:** Historical overview of Socialism as a form of modern secular creed from the early 19th century to the present. It takes a global history approach, with a focus on the diversity of socialist movements: from Marxism, Anarchism, and Fabians to Social Democracy, Soviet Communism, Maoism, the Israeli kibbuzim movement, Tanzanian ujamma, Bolivarian socialism in Venezuela, and the Western New Left.

#### HIST 4162 - Russia after 1917

**Credit Hours:** (3) **Description:** Detailed study of Russia/Soviet Union from the 1917 Bolshevik Revolution to its dissolution in 1991 and beyond. Major themes include the evolution of Soviet Communism, Soviet nationalities policies, Stalinism, World War II, Cold War, the fall of the USSR, and contemporary Russia, including an analysis of Putin's regime.

#### HIST 4213 - Women/Gender/Latin America

**Credit Hours:** (3) **Description:** Examination of roles of women and gender in Latin America from colonial times to beginning of twentieth century.

## HIST 4221 - 20th Century Latin Amer Rev

**Credit Hours:** (3) **Description:** Critical comparative examination of twentieth-century revolutionary movements in Latin America, focusing on Mexico, Guatemala, Nicaragua, and Chile.

#### HIST 4222 - Race/Class in Latin America

**Credit Hours:** (3) **Description:** Examination of colonial times to present, focusing on development of racial, ethnic, class identities, and their roles in economic, social, political, and cultural life.

## HIST 4223 - Contemporary Latin America

**Credit Hours:** (3) **Description:** This course gives students the opportunity to engage in major themes in the history of Latin America since World War II. The approach is chronological and thematic and the major themes include: the Mexican and Cuban Revolutions; the Cold War; classic populism and new populist experiences; the emergence of working and middle classes; threats and challenges of democracy; economic crisis, poverty and exclusion; drug trafficking and migration; women in politics; and neo-liberalism and its discontents

#### HIST 4260 - World since 1945

**Credit Hours:** (3) **Description:** Global ideological, economic, religious, and political developments since World War II. Emphasizes globalization, decolonization, and Cold War politics

#### HIST 4272 - Modern Middle East \*\*

**Credit Hours:** (3) **Description:** Political, diplomatic, social and religious developments in Middle East from 1800 to present.

## HIST 4276 - The Arab-Israeli Conflict

**Credit Hours:** (3) **Description:** Study of the conflict between Palestinians and Israelis through analysis of religious, social, political, an dcultural developments from the 19th century until the present day. Topics inlcude Zionism in late Ottoman Palestine, the creation of the Jewish state of Israel and of the Palestinian refugee crisis, the Lebanese Civil War, and numerous Arab-Israeli wars.

#### HIST 4277 - Ottoman Empire \*\*

**Credit Hours:** (3) **Description:** Ottoman Empire people, geography, cultures, politics, administration, economy, and societies from its rise in the 13th century until its demise in 1922; major historiographical debates and literature related to the Ottoman Empire through primary and secondary sources, art, and literature.

#### HIST 4283 - History/South Africa

**Credit Hours:** (3) **Description:** Human origins to present with emphasis on economic and political history of 19th and 20th centuries; history examined within larger context of events throughout entire southern African region and globally; apartheid system and liberation ideologies such as socialism, Pan-Africanism, Black Consciousness explored through study of primary documents, film, music.

## HIST 4285 - Afro-Cuban History and Culture

**Credit Hours:** (3) **Description:** History and culture of Afro-Cubans from origins to the present with particular emphasis on the Cuban Revolution. Enrollment by permit only and restricted to participants in the Cuba study abroad program.

#### HIST 4288 - West Africa/Diaspora \*\*

**Credit Hours:** (3) **Description:** West Africans from 15th century to present; Trans-Atlantic Slave Trade and African Diaspora in the Americas; economic and social history of period through study of primary documents, film, music.

#### HIST 4289 - African Women's History

**Credit Hours:** (3) **Description:** Women of African continent from human origins to present; major epochs in African history; diversity of continent; theoretical issues related to gender through study of primary documents, fiction, film.

#### HIST 4292 - Modern China 1800-Present \*\*

Credit Hours: (3)

HIST 4294 - Modern Japan 1800-Present \*\*

**Credit Hours:** (3)

#### HIST 4320 - Ancient Near East

**Credit Hours:** (3) **Description:** From the beginnings of Mesopotamia down through the great empires of Assyria, Babylon, and Persia.

#### HIST 4321 - Greek Experience \*\*

**Credit Hours:** (3) **Description:** Politics, society and culture in ancient Greece to Alexander the Great.

#### HIST 4322 - The Roman World

**Credit Hours:** (3) **Description:** The Roman Republic and the Roman Empire.

#### HIST 4323 - Egypt of the Pharaohs \*\*

**Credit Hours:** (3) **Description:** Survey of ancient Egyptian civilization, covering major political and social developments, religion, writing and literature, Egypt's relations with the rest of Africa, and sample problems illustrating how Egyptologists make sense of the scattered remains from which our understanding of ancient Egypt must be built.

#### HIST 4361 - History of Byzantine Empire \*\*

**Credit Hours:** (3) **Description:** Byzantine or East Roman Empire from 330 to 1453 and its influence on Slavic, Turkic, and Islamic peoples.

# HIST 4380 - Renaissance and Reformation Europe, 1400-1650

**Credit Hours:** (3) **Description:** Exploration of the European Renaissance and Reformation, including civic and Christian humanism; republicanism and despotism; the print revolution; the creation of new Protestant churches and the reform of the Roman Catholic Church; and the Reformation's impact on the development of early modern states and societies. NOTE: Only one of HIST 4380 and HIST 3880 may be used to satisfy degree requirements.

#### HIST 4381 - The Enlightenment, 1650-1815

**Credit Hours:** (3) **Description:** The Enlightenment has been described as a "revolution of the mind" and also as a "crisis of the mind," a century when Europeans' understanding of themselves, their societies, and their place in the world was irrevocably transformed. In this course we will consider the nature of this intellectual and cultural revolution. Did Enlightenment thinkers invent modern political freedom or lay the groundwork for new forms of colonial oppression, slavery, and political terror? Did the Enlightenment justify empire or critique it? What role did religion and religious thought play in the Enlightenment? What was the relationship between the Enlightenment and the revolutions that convulsed the British, French, and Spanish empires at the end of the eighteenth century?

#### HIST 4386 - Intro to Museums

**Credit Hours:** (3) **Description:** Overview of museums and the museum field, including history, development, philosophy, function and current and future trends in museums. Repeatable May not be repeated for credit. *Cross listing:* (Same as ARTH 4386).

## HIST 4399 - Topics in European History

Credit Hours: (3) Description: Topics in European History is designed to instruct you in a topic or area of Modern European history that reflects the research strengths and interests of our European faculty. Instead of reflecting established national boundaries or discrete temporal period, or striving for comprehensive coverage, like our standard European curriculum courses, Topics courses follow the interests and concerns of the instructor. Courses might cover a discrete historical event, like the Holocaust or 1989 and the end of the Cold War, or they might explore a particular topic across a longer time period, like modern intellectual and cultural history or the history of anti-Semitism. Whatever the subject, a Topics course will encompass the professor's particular area of expertise and research, introduce you to the methods and skills of a practicing historian, and emphasize advanced historical and historiographical skills reminiscent of what you would encounter in a history graduate program. A Topics course is reading and writing intensive and based on in-class discussion. Repeatable up to 6 hours. Repeatable 2

#### HIST 4403 - European Empires

**Credit Hours:** (3) **Description:** A history of European colonial empires from the 17th to the 20th century. Topics include capitalism and commerce; the transatlantic slave trade; colonial science and social science; intercultural exchange; scientific racism and the civilizing mission; empire and popular culture; anticolonial nationalism and decolonization; and neocolonialism and globalization.

#### HIST 4440 - French Revolution

**Credit Hours:** (3) **Description:** In-depth study of the origins, course, and outcome of the French Revolution (1789-1815). Topics include the Enlightenment and the decline of the Old Regime; the causes of the Revolution; democratization and radicalization; counter-revolution and dictatorship; the Napoleonic Wars; and the Revolution's place in the historiography and history of the modern world.

#### HIST 4461 - Europe in the Age of Total War, 1914-1945

**Credit Hours:** (3) **Description:** Examination of a tumultuous period in European and world history, including the First World War, the foundation of the Soviet Union, the rise of fascism in Italy and Germany, economic and political crises, imperialism, World War II, and the Holocaust.

#### HIST 4463 - Europe, 1945 to Present

**Credit Hours:** (3) **Description:** A history of Europe from World War II to present, including the war and its legacies, the Cold War, the 1960s, European unification, the post-Soviet era, and contemporary debates around immigration and European identity.

#### HIST 4620 - Colonial America to 1783 \*\*

**Credit Hours:** (3) **Description:** Political development and economic, social and cultural institutions of English Colonies in America, including origins and conduct of American Revolution.

#### HIST 4630 - New Nation/1783-1815 \*\*

Credit Hours: (3)

#### HIST 4640 - Jackson America 1815-1850

Credit Hours: (3)

#### HIST 4680 - Emr Modern America 1877-1914

**Credit Hours:** (3) **Description:** United States from end of Reconstruction to outbreak of World War I.

#### HIST 4701 - U S 1914 to World War II

**Credit Hours:** (3) **Description:** United States from outbreak of World War I to World War II.

#### HIST 4702 - U S Since W War II \*\*

**Credit Hours:** (3) **Description:** The United States from World War II to present.

#### HIST 4801 - Black Memphis

**Credit Hours:** (3) **Description:** This course will focus on the social and cultural, political, and economic roles of African Americans in Memphis from the early nineteenth century through the early twenty-first century. The course will place Memphis in the context of state, regional and national events, and will explore issues of race, class and gender both within African American communities and between African Americans and other populations in the city. We will first explore the early migrations of African Americans into Tennessee and into Memphis/Shelby County, the lifestyles of enslaved and free African Americans in the area; the impact of Civil War emancipations and migrations on social, political, and economic life in Memphis; African American communities that developed in the late nineteenth and early twentieth century; the impact of Progressivism on the city's black communities; the Civil Rights and Black Freedom movements in the city, and racial dynamics in contemporary Memphis.

#### HIST 4823 - American Labor History

**Credit Hours:** (3) **Description:** Historical development of labor movement in United States; emphasis on social, economic, and political trends related to labor movement.

#### HIST 4824 - Business History

**Credit Hours:** (3) **Description:** Historical development of business in the United States; attention to social, economic, and political trends related to American business communities.

#### HIST 4831 - History American Family \*\*

**Credit Hours:** (3) **Description:** Analysis of changes in family size and structure and relationships between family and society from colonial times to present.

## HIST 4851 - History of Women in America \*\*

**Credit Hours:** (3) **Description:** History of women from discovery of America to present. **[G]** 

## HIST 4853 - African American Women

**Credit Hours:** (3) **Description:** Social, political, economic, cultural history of African American women from the sixteenth century to the present.

## HIST 4861 - Parks/People/Public Policy

**Credit Hours:** (3) **Description:** Comparative study of history and administration of public land areas in the United States, and of American conservation.

#### HIST 4863 - History/Childhood in America \*\*

**Credit Hours:** (3) **Description:** Historical consideration of children and childhood in American society from early 17th century to present.

## HIST 4871 - U S Urban History

**Credit Hours:** (3) **Description:** Development of American cities, including formation of local social, economic, and political institutions, and impact of urbanization on United States.

## HIST 4879 - Africa to the Americas

**Credit Hours:** (3) **Description:** Arrival of Africans in western hemisphere; expansion of antebellum slavery into US lower south by 1820; African Diaspora; colonial slavery; impact of slavery on formation of United States; development of African American culture; relationships between enslaved and free Blacks, Europeans, Native American during colonial and early national periods. **PREREQUISITE:** HIST 3881, or AAAS 2100, or equivalent introductory survey course.

## HIST 4880 - Slavery/Freedom/Segregation

**Credit Hours:** (3) **Description:** African Americans from 1820s to early 1900s; social, political, economic developments; antebellum slavery and freedom; impact of westward expansion; Civil War emancipation and post-war construction of freedom; development and impact of legal and extra-legal segregation; black nationalism and PanAmericanism; Progressivism through beginnings of Great Migration.

# HIST 4882 - Civil Rights Movement

1240 **Credit Hours:** (3) **Description:** Struggle for African American equality, with emphasis on key civil rights issues, events, leaders, and strategies. **PREREQUISITE:** HIST 3881, or AAAS 2100, or equivalent introductory course.

#### HIST 4996 - Honors Thesis

**Credit Hours:** (3) **Description:** Under direction of faculty member, and with approval of Honors Committee, student writes thesis based on research in primary and/or secondary sources. **PREREQUISITE:** admission to Honors Program.

#### HIST 4999 - The Historian's Craft

**Credit Hours:** (3) **Description:** A synthetic examination of the nature of historical inquiry as practiced by the discipline of history, including historical interpretation and controversy, analyses of historical sources, historical research and writing and integration of the various subfields of the discipline of history. **PREREQUISITE:** 21 hours in history.

## HPRM 1050 - Business of Hospitality

**Credit Hours:** (3) **Description:** (2010). Varied aspects of lodging, food service, clubs, cruise lines, natural attractions, man-made attraction, transportation, intrastructure; retail businesses; sports; special events and activities; outfitters, tour operators, travel management; destination marketing organizations.

## HPRM 2003 - Special Events

**Credit Hours:** (1) **Description:** Introduction to special events management and potential careers in this field. Hands on experience with special events while partnering with destination management company to work with planning and operations in multifaceted special events area.

#### HPRM 2004 - Distinguished Speakers

**Credit Hours:** (1) **Description:** Series of lectures from high ranking professionals from the hospitality industry in areas of lodging, food service and tourism.

#### **HPRM 2006 - Professional Development**

**Credit Hours:** (1) **Description:** Conducting a self-assessment; development of a resume and self promotion materials; presentation skills; social skills needed to obtain and retain career position; corporate communication skills.

#### HPRM 2007 - Resort Management

**Credit Hours:** (1) **Description:** Currents events and trends in the resort and tourism industry; impact of external publics on resort industry; identifying resort management decision-making tools.

## HPRM 2011 - Hosp Ind Managerial Acct

**Credit Hours:** (3) **Description:** Presentation, interpretation, and analysis of internal and external hospitality financial reports affecting management decisions using Uniform Systems of Accounting. **PREREQUISITE:** HPRM 1050.

#### HPRM 2012 - Intro to Culinary Arts

**Credit Hours:** (3) **Description:** This course will provide the student with a cursory understanding of fundamental culinary theory and techniques by exposing the student to the basic principles of culinary arts. The primary goal of this class is to acquire the culinary skills needed for success in a career as a food service professional. Skills practiced will include basic kitchen safety and sanitation, knife skills, stock production, soups, sauces, breakfast cooking, and fresh pasta. The course also provides an overview of basic culinary units of measure, culinary history, and professionalism in the culinary industry. Fee \$60 per credit hour Lab Fee

## HPRM 2013 - Intermediate Culinary Techniques

**Credit Hours:** (3) **Description:** This course will provide the student with a cursory understanding of some of the more intermediate culinary theories and techniques. The primary goal of this class is to acquire the basic culinary skills needed for success in a career as a food service professional. Skills practiced will include basic kitchen safety and sanitation, knife skills, meat and seafood identification and fabrication, dry heat cooking methods, moist heat cooking methods and combination cooking methods. The course also provides an overview of types and anatomy of poultry, meat and seafood, vegetables and fruits, pastas, legumes, and rice, and a review of the various cooking methods used in professional kitchens. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

# HPRM 2014 - Culinary Leadership & Professionalism

**Credit Hours:** (3) **Description:** This course will provide the student with an understanding of the unique topics faced while managing and supervising the human resources in the hospitality industry and to provide students with a detailed picture of how successful companies manage human resources in order to compete effectively in a dynamic, global environment. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

## HPRM 2015 - A la Carte & Restaurant Service

**Credit Hours:** (3) **Description:** This course will provide the student with hands on experience in a real-world restaurant environment. Each student will experience all aspects of working in a restaurant and performing a la carte dining service. Various topics are covered, including table service, wine, coffee and tea service, cooking at the various stations in the kitchen, including hot line, cold line, prep, and others. The student will be responsible for producing high quality meals under the direction of the instructor and serving the public. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

**Credit Hours:** (3) **Description:** This course will provide the student with a cursory understanding of introductory theory and techniques of the baking and pastry arts. The primary goal of this class is to acquire the basic culinary skills needed for success in a career as a food service professional. Skills practiced will include baking mise en place; yeast breads; pastry doughs and batters; custards, creams and mousses; fillings, frostings, and dessert sauces; and plated desserts. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

## HPRM 2017 - Food Composition & Sanitation

**Credit Hours:** (3) **Description:** This course will provide the student with a cursory understanding of basic food composition and food safety and sanitation. The primary goal of this class is to acquire the basic culinary skills needed for success in a career as a food service professional. Topics include fundamentals in nutrition and food, developing and marketing healthy recipes and menus, and nutrition's relationship to health and life span. It will also cover topics in kitchen safety and sanitation, such as foodborne illnesses, pathogens, contamination, storage, proper cooking, and other subjects. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

#### HPRM 2018 - Intro to Garde Manger

**Credit Hours:** (3) **Description:** This course will provide the student with a cursory understanding of introductory theory and techniques of Garde Manger – the art of the cold kitchen. The primary goal of this class is to acquire the basic culinary skills needed for success in a career as a food service professional. Skills practiced may include cold sauces and soups, salads and sandwiches; cured and smoked foods, sausage, terrines, pâtés, galantines, and roulades; cheese, appetizers and Hors d'oeuvres; and condiments, crackers, and pickles. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

## HPRM 2019 - Culinary Internship

**Credit Hours:** (2) **Description:** Work-based learning course that enables students to develop practical skills, relate theory to practice and to gain a sound base of industrial experience by working, on a paid or voluntary basis, for an organization within the hospitality and tourism industry; develops practical competencies to assist in progressing toward a career in the hospitality industry. Students are expected to submit weekly reports and a final report as a requirement for this course. Fee \$130 per credit hour Lab Fee NOTE: For Students in Certificate Program Only **PREREQUISITE:** HPRM 2012

#### HPRM 2056 - Restaurant Serv Mgmt Lab

Credit Hours: (2) Description: Lab to go with HPRM 3070.

#### HPRM 2111 - Intr/Hospitality Indstry Exper

**Credit Hours:** (1) **Description:** Introduction to internship requirement and development of job search skills. **PREREQUISITE:** HPRM 1050 or permission of instructor.

# HPRM 2751-2760 - Special Topics in Hospitality and Resort Management

**Credit Hours:** (3) **Description:** Current topics in hospitality management. May be repeated for credit with change in topic.

## HPRM 2900 - Intermed ELC in Hospitalty Mgm

**Credit Hours:** (1) **Description:** Experiential learning credit (ELC) through a formal evaluation process.

#### HPRM 2999 - Purchase/Hospitality Industry

**Credit Hours:** (1) **Description:** Purchasing in commercial restaurants, hotels, food service, contract food service, institutional food service, catering, quick service.

#### HPRM 3010 - Hospitality/Resort Colloquium

**Credit Hours:** (1) **Description:** Introduction to hospitality and resort industry; presentations and discussions by major industry professionals; students submission of a synopsis of each speaker's major points. **PREREQUISITE:** junior-level standing.

#### HPRM 3012 - Culinary Theory & Skills

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of primary culinary theory and techniques. The primary goal of this class is to acquire the culinary skills needed for success in a career within the food service or hospitality industry. In addition to more in-depth learning, students will develop skills including kitchen safety and sanitation, knife skills, stock production, soups, sauces, breakfast cooking, and fresh pasta. The course also provides an overview of basic culinary units of measure, culinary history, and professionalism in the culinary industry. Fee \$60 per credit hour Lab Fee

#### HPRM 3013 - Advanced Culinary Skills

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of primary culinary theory and techniques. The primary goal of this class is to acquire the culinary skills needed for success in a career within the food service or hospitality industry. In addition to more in-depth learning, students will develop skills including kitchen safety and sanitation, knife skills, meat and seafood identification and fabrication, dry heat cooking methods, moist heat cooking methods and combination cooking methods. The course also provides an overview of types and anatomy of poultry, meat and seafood, vegetables and fruits, pastas, legumes, and rice, and a review of the various cooking methods used in professional kitchens Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 2012

#### HPRM 3014 - Pastry & Baking

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of primary baking and pastry theory and techniques. The primary goal of this class is to acquire the culinary skills needed for success in a career within the food service or hospitality industry. In addition to more in-depth learning, students will develop skills including baking, yeast breads, pastry doughs and batters, custards, creams and mousses, fillings, frostings, dessert sauces, plated desserts and more. Fee \$60 per credit hour Lab Fee

#### HPRM 3015 - Food Analysis

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of food composition and analysis. The primary goal of this class is to acquire the culinary skills needed for success in a career in the food service profession. Topics include fundamentals in nutrition and food, developing and marketing healthy recipes and menus, and nutrition's relationship to health and life span Fee \$60 per credit hour Lab Fee

#### HPRM 3016 - Garde Manger

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of the theory and techniques of Garde Manger – the art of the cold kitchen. The primary goal of this class is to acquire the culinary skills needed for success in a career within the food service or hospitality industry. In addition to more in-depth learning, students will develop skills including cold sauces and soups, salads and sandwiches; cured and smoked foods, sausage, terrines, pâtés, galantines, and roulades; cheese, appetizers and Hors d'oeuvres; and condiments, crackers, and pickles. A key component is the total utilization of product culminating in a Grand Buffet. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 2012

#### HPRM 3017 - Culinary Procurement & Purchasing

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of the complex and critical world of purchasing and Procurement of food items, supplies, and equipment, from selecting venders to writing specification sheets to the final purchase and delivery and through the life of the product. Study of purchasing and inventory management of foods and other supplies to include development of purchase specifications, determination of order quantities, formal and informal price comparisons, proper receiving procedures, storage management, and issue procedures. Emphasis on product cost analysis, yields, pricing formulas, controls, and record keeping at each stage of the purchasing cycle. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 2012

#### HPRM 3018 - International Cuisine

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of the theory and techniques of International Cuisine. From Central and South America to the exotic far East, this course will explore the cuisines of the various regions throughout the world, emphasizing the culture and the history of the

region to understand the evolution of flavors within the food philosophies, and aid the learner in understanding the complex and wildly diverse world of International cuisine. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 2012

## HPRM 3021 - Artisan Breads and Pastries

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of the skills and techniques of artisan breads and pastries production. Products covered include commercially yeasted breads, rolls, savory quick breads, petit fours, puff pastry, phyllo dough, pate choux, and many others. Properties and characteristics of ingredients, the baker's percentage system and scaling methods are studied, as well as proper mixing techniques, controlled fermentation, and baking methodology. With this strong foundation of knowledge, a baker or pastry chef can develop further skills, experiment with new ideas, and understand any formula. Fee \$60 per credit **PREREQUISITE:** HPRM 2012

## HPRM 3022 - Plated Desserts

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of the elements and principles of design as they relate to plated desserts. Topics include plate composition, portioning, flavor pairings, textures, temperatures, eye appeal, balance, color harmony and plate decorating/painting techniques such as stenciling and chocolate striping. Upon completion, students should be able to demonstrate competence in combining a variety of dessert components enhanced with plate decorating techniques. Fee \$60 per credit hour Repeatable No **PREREQUISITE:** HPRM 2012

## HPRM 3023 - Chocolate and Confections

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of advanced pralines, bon bons, truffles, marzipan, molded and hand-dipped chocolate, caramels, nougats, pate de fruit, and other confections using commercial production and finishing techniques. In addition, the course content includes aspects of planning, artistic design, preparation and arrangement of small showpieces made from chocolate, poured sugar, pulled sugar, blown sugar and pastillage. Fee \$60 per credit hour Repeatable No **PREREQUISITE:** HPRM 2012

## HPRM 3024 - Contemporary Cakes

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of cakes that are assembled and decorated with a modern approach using the latest technology and equipment. Topics will include small cakes decorated as a whole; cakes finished in molds or rings; and items that can be used for cakes, desserts, or individual pastries. Students will use specialized equipment, practice new presentation methods, and focus on fresh products, simplicity of style, and ease of production. Fee \$60 per credit hour Repeatable No **PREREQUISITE:** HPRM 2012

#### HPRM 3050 - Food/Beverage Controls

1243 Credit Hours: (3) Description: Fundamentals of food, beverage and labor control through menu planning, engineering and cost analysis. PREREQUISITE: HPRM 1050, HPRM 2011, HPRM 3070.

#### HPRM 3060 - Food & Bev. Production Theory

**Credit Hours:** (1) **Description:** Roles and standard operating procedures used for food and beverage operations in lodging settings. Emphasis on food preparation techniques, basic purchasing procedures, kitchen and dining equipment, product identification and guest services styles and standards used in various lodging operations. Fee \$60 per credit hour Lab Fee **COREQUISITE:** HPRM 3061

## HPRM 3061 - Food and Beverage Production Lab

**Credit Hours:** (1) **Description:** This is a laboratory-based course designed to provide students with an understanding of quantity food production principles and techniques. Students in this class apply foundational cooking skills production skills in the actual operation of a restaurant facility. Fee 60.00/credit hour

## HPRM 3062 - Restaurant Management Service Lab

**Credit Hours:** (1) **Former:** HPRM 2052 **Description:** This is a laboratory-based course designed to provide students with an understanding of front-of-the-house (FOH) restaurant service principles and techniques. Students in this class apply organizational and management skills in the actual operation of the Kemmons Wilson Culinary Institute restaurant facility. In addition to online lectures and information, students participate in a laboratory session on respective lab session days between 11:30 AM and1:00 PM. Fee \$60.00/credit hour

## HPRM 3070 - Food Production and Service

**Credit Hours:** (4) **Description:** Theory, application and understanding of safe food production methods and terminology; culinary hand tools and equipment operation including knife usage; principles and applied fundamentals of property service techniques and beverage handling. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 1050.

#### HPRM 3130 - Hospitality Law Ethics & Risk

**Credit Hours:** (3) **Description:** Laws and regulations applicable to the ownership and operation of inns, hotels, motels, resorts, restaurants, bars, and other hospitality businesses; laws and regulations that influence business and management decisions in the hospitality industry; ethical issues involved in managing hospitality operations. Fee \$60 per credit hour Lab Fee

## HPRM 3315 - Hospitality Human Resource Mgmt

**Credit Hours:** (3) **Description:** Acquisition, utilization, and retention of human resources in hospitality industry; human resource planning, job analysis, recruitment, selection, orientation, training, development,

motivation, associate relations, performance appraisal, legal issues. Fee \$60 per credit hour Lab Fee

## HPRM 3320 - Hospitality Financial Mgmt

**Credit Hours:** (3) **Description:** Fundamental principles and concepts of revenue management including capacity management, duration control, revenue forecasting, discounting, displacement analysis, rate management, and dynamic pricing. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 2011, HPRM 3330.

## HPRM 3330 - Managing Hotel and Resort Operations

**Credit Hours:** (2) **Former:** HPRM 2330 **Description:** This course focuses on the management of critical resources essential for running hotel and resort operations in an effective and efficient manner. The basic principles of operating a lodging facility, which includes accounting, housekeeping, engineering, front desk, food and beverages, and guest services functions will be explained. Fee \$60 per credit hour Lab Fee

## HPRM 3331 - Lodging Management Lab

**Credit Hours:** (1) **Former:** HPRM 2331 **Description:** The overall aim of the practicum course is to enable students to develop a practical understanding of the basic principles and procedures underlying the primary areas of lodging operations. The working environment practicum rotation experiences will be held at The Holiday Inn Hotel at the University. Fee \$60 per credit hour Lab Fee

#### HPRM 3600 - Entertainment Management

**Credit Hours:** (3) **Description:** Fundamental standards, techniques, practices of club, cruise, gaming, theme park, special events management. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 1050.

#### HPRM 3650 - Comm & Rec Food Serv Mgmt

**Credit Hours:** (3) **Description:** This course focuses on all the general facets of the commercial foodservice industry including: a brief history of the development of hospitality and professional foodservice; various types and styles of commercial foodservice operations such as amusement, stadiums, corporate, military, etc.; employment opportunities in commercial foodservice; professional development and certifications; and the benefits of professional networking. Fee \$60 per credit hour Lab Fee

#### HPRM 3680 - Intro to Wine & Spirits

**Credit Hours:** (3) **Description:** The application of the management principles and procedures related to the sale and service of alcohol and specialty beverages served in the beverage and hospitality industry. Beverage tasting and sensory analysis of products commonly served in

1244 the beverage industry. Permit Required. Must be over 21 years to register for this class. Fee \$60 per credit hour Lab Fee

#### HPRM 3700 - Reel Food: Culinary in Movies

**Credit Hours:** (3) **Description:** To examine Food as a central theme in film, the role that food plays in the story, the lives of the characters, and how food is used both as an element of expression and as a transforming agent. Students will have the opportunity to recreate the dishes in each film and heighten their technical skills and dexterity and explore the intricacies of each cuisine and discipline. Fee \$60 per credit hour Lab Fee

# HPRM 3810 - Food Safety & Sanitation in Hospitality

**Credit Hours:** (3) **Description:** Introduction to sanitation in public health as related to the food service industry, including potential hazards that may occur in the operation and production of food. Fee \$60 per credit hour Lab Fee

#### HPRM 3911 - Pre-Intern & Prof Development

**Credit Hours:** (3) **Description:** Focus on the requirements and process for applying and successfully completing an internship program at Kemmons Wilson School of Hospitality and Resort Management. Students will also learn about professionalism and resume writing skills. Prerequisite for HPRM 4911. Fee \$60 per credit hour Lab Fee

#### HPRM 4000 - Culinary Tourism

**Credit Hours:** (3) **Description:** Theory and principals of food tourism, experiential food travels, and leisure food related activities. The course will focus on food as heritage through an analysis of culinary tourism, food in urban settings, the culture of restaurants, celebrity chefs and the influences of social media/television. This class will examine the role that food plays in shaping: destinations and personal identities, ethnic affiliations in a global world, and the revitalization of local and global communities. Through readings assignments and local travels students will explore how "food traditions" and "local food" are maintained and transformed over time and space, creating a culinary identity. Fee \$60 per credit hour Lab Fee

#### HPRM 4007 - Resort and Timeshare Mgmt

**Credit Hours:** (3) **Description:** Overview of dynamic resort and distinctive lodging industry; differences in core lodging competencies between resorts and traditional hotels, such as accounting and human resources. Fee \$60 per credit hour Lab Fee

#### HPRM 4012 - Senior Culinary Design

**Credit Hours:** (3) **Description:** This course will provide the student with an opportunity to put it all together. Using their skills from menu development, costing, ordering, preparing, cooking, serving, managing, and follow through, the students finish strong with a Capstone event or

dinner as the culmination of their journey. Fee \$60 per credit hour Lab Fee NOTE: Registration by Permit Only

# HPRM 4020 - Foundations of Project Management for the Hospitality Industry

**Credit Hours:** (3) **Description:** This course is intended to cover most of the fundamental aspects of modern Project Management, both managerial and technical, as well as to give the students direct experience in implementing appropriate tools and techniques specific to the hospitality industry. By the end of this course, students should have a mastery of the basic theory and practice of Project Management, as described by the core knowledge modules (KMs). Fee \$60 per credit hour Lab Fee Repeatable No **PREREQUISITE:** Students must have completed at least 60 credit hours.

## HPRM 4021 - Banquet and Catering Management

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of Quantity food production as applied to a catering setting. Students will design, plan, setup, prepare and serve various banquet and catering functions during the semester utilizing skills learned in previous courses. Fee \$60 per credit hour Repeatable No **PREREQUISITE:** HPRM 2012

## HPRM 4022 - Special Events Management Capstone

**Credit Hours:** (3) **Description:** This course will provide the student with an in-depth understanding of what it takes to pull-off a major event like a festival, a wedding, a gala event, and others. We hope to introduce you to the many facets of managing an event - from marketing and ticketing, to operations and evaluation. You'll learn the importance of planning, budgeting, and customer service. Through instruction, observation, and analysis you'll probe, dissect, and draw conclusions about "what works" in event management. The principles and concepts you learn will be transferable to many of the "productions" you might be responsible for as an event manager for a venue, an artist, or an event caterer. As a capstone class, this course will culminate in the planning, organizing, and execution of a major special event. Fee \$60 per credit hour Repeatable No **PREREQUISITE:** By Permit Only

# HPRM 4101 - Field Experience in Hospitality and Resort Management

**Credit Hours:** (1-12) **Description:** The business of hospitality is multi-faceted and extremely competitive. One of the most valuable resources of the Kemmons Wilson School program is its connection with the industry leaders in the Memphis area and across the country. These ties impact the students in numerous ways, notably with experiential learning and volunteer opportunities throughout the academic year. HPRM 4101 credit may range from 1-12 credit hours, but requires permission from the Internship Coordinator and submission of the below Information Form. Students can be approved and register for HPRM 4101 credit until the Friday of the first week of the upcoming semester. Throughout the semester, the student will be

responsible for completing and uploading timesheets to the eCourseware dropbox as well as submitting a site supervisor evaluation at the culmination of the semester. This course is pass/fail determined by both the site and university supervisors based on the student's completion of registered credit hours and evaluation. Fee \$60 per credit hour Lab Fee

## HPRM 4111 - Prof Development/Hospitality

**Credit Hours:** (1) **Description:** Fundamental of resume preparation, interviewing styles and strategies, and business etiquette through professional development workshops and presentations from successful hospitality professionals. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 1050, HPRM 2111, senior standing in HPRM.

## HPRM 4301 - Event Management for HPRM/PR

**Credit Hours:** (3) **Description:** (Same as PBRL 4301). Researching, planning, coordinating, marketing, managing, and evaluating the planning for special events in the hospitility industry. Special attention will be given to the needs of the public relations industry. Hands on experience will be integrated into the curriculum. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** students must have completed 60 hours of coursework.

## HPRM 4302 - International Events

**Credit Hours:** (3) **Description:** This course will provide an overview of the considerations when planning events that are held outside of the United States or that attract a large number of participants from outside the United States. We will explore each of the major sectors of international events including: destination assessment, currency exchange, language and cultural considerations, preparing for travel abroad, and safety/risk assessment. The course will review the roles of organizations and individuals involved in the businesses that comprise this industry. Fee \$60 per credit hour Lab Fee

## HPRM 4320 - Hospitality Services Mktg

**Credit Hours:** (3) **Description:** Principles and models of services marketing with focus on applications to hospitality services industry; expansion of traditional marketing mix variables into additional development of hospitality service concepts, marketing plans, and service quality assessments. Fee \$60 per credit hour Lab Fee

## HPRM 4322 - Adv Food/Beverage Management

**Credit Hours:** (3) **Description:** (Same as NUTR 4322). Foundations of managing restaurants and associated beverage operations; planning and control procedures, human resources management, customer service, marketing strategies, and emerging technologies; relationship between food and beverage operations and overall hospitality organization. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** MGMT 3110

# HPRM 4323 - Advanced Culinary Skills Lab

#### Credit Hours: (3)

Description: Advanced Culinary Arts prepares students for occupation and higher education programs of study related to the entire spectrum of career in the food industry, including (but not limited to) food production and services; food science; dietetics, and nutrition; baking and pastry arts. Major topics for this advanced course include: basic baking theory and skills, introduction to breads, introduction to pastry arts, nutrition, nutrition accommodations and adaptations, cost control and purchasing, and current marketing trends. Instruction and intensive laboratory experiences include commercial application of principles of nutrition, aesthetic, and sanitary selection; purchasing, storages, preparation, and service of food and food products; using and maintaining related tools and equipment; baking and pastry arts skills, managing operation in food service, food science, or hospitality establishments; providing for the dietary needs of person with special requirements, and related research, development, and testing. Intensive laboratory experiences with commercial application are a required component of this course study. Student laboratory experiences may be either school-based or "on- the-job" or a combination of the two. Advanced Culinary Arts builds upon skills and techniques learned in Culinary Arts and Hospitality Management, which must be successfully completed before enrolling in the advanced course. Work-based experiences in the food industry are strongly encouraged. A standards-based plan guides the students' laboratory and workbased experiences. Students are monitored in these experiences by the Advanced Culinary Arts teacher. PREREQUISITE: HPRM 2012

#### HPRM 4331 - Adv Resort/Lodging Management

**Credit Hours:** (3) **Description:** Issues, theories, and best practices of resort and lodging industry. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 3330.

#### HPRM 4340 - Information Technology HPRM

**Credit Hours:** (3) **Description:** Framework for information technology, systems development methodologies, and strategic information systems planning; current issues relating to the hospitality industry; focus on using information technology in networked environment to achieve organizational goals and objectives. Fee \$60 per credit hour Lab Fee

#### HPRM 4350 - Properties Develomnt/Planning

**Credit Hours:** (3) **Description:** Problems and opportunities inherent in developing and planning resort and hospitality facilities; sequence of property development, conceptual and space planning, design criteria, and construction management; establishing appropriate facilities requirements, understanding industry practices, and implementing properties decisions with integrated design, operations, financial and real estate framework. Fee \$60 per credit hour Lab Fee

#### HPRM 4400 - International Hospitality

**Credit Hours:** (3) **Description:** Issues, challenges and practices of global hospitality and tourism marketplace. Fee \$60 per credit hour Lab Fee

#### HPRM 4401 - Management of Tourism

**Credit Hours:** (3) **Description:** Tourism as a system; interaction of various parts of tourism; managers influence in tourism's success. Fee \$60 per credit hour Lab Fee

#### HPRM 4620 - Hospitality Operational Anlys

**Credit Hours:** (3) **Description:** Management tools in analyzing operational effectiveness of hotels and resorts. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 3330.

#### HPRM 4700 - Integrative Challenge

**Credit Hours:** (3) **Description:** Capstone course integrating academic and experiential learning through service learning projects building on leadership skills. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** HPRM 4315, HPRM 4320.

High Impact Practice Code: Learning Community

## HPRM 4751-4760 - Special Topics in Hospitality and Resort Management

**Credit Hours:** (1-6) **Description:** Current topics in hospitality management. May be repeated for credit with change in topic. Fee \$60 per credit hour Lab Fee

#### HPRM 4900 - Advanced ELC in Hospitality Mg

**Credit Hours:** (1) **Description:** Students may earn up to 30 upperdivision hours of ELC/PLA credit through a formal evaluation process. Fee \$60 per credit hour Lab Fee

#### HPRM 4910 - HPRM Problems

**Credit Hours:** (1-6) **Description:** Approved research projects with faculty supervision. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** senior standing and permission of department chair.

#### HPRM 4911 - Hospitality Mgmt Internship

**Credit Hours:** (2) **Description:** Work-based learning course that enables students to develop practical skills, relate theory to practice and to gain a sound base of industrial experience by working, on a paid or voluntary basis, for an organization within the hospitality and tourism industry; develops practical competencies to assist in progressing toward a career in the hospitality industry. Students are expected to submit weekly reports and a final report as a requirement for this course. Fee \$60 per credit hour Lab Fee Repeatable Up to 6 credit hours. **PREREQUISITE:** Junior standing, and a minimum 2.7 GPA.

#### HPRM 4996 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research open only to students enrolled in the Honors Program. Thesis supervised by area faculty member. Fee \$60 per credit hour Lab Fee **PREREQUISITE:** senior standing and and permission of the Director of the College Honors Program.

## ICL 2001 - Seminar in Urban Education

**Credit Hours:** (0) **Description:** River City Scholars are required to actively engage in a zero-credit seminar in urban education every semester. Seminars will guide learning experiences in classrooms, schools, and communities, and provide opportunities for discussion, reflection, personal and academic development, identity formation, and problem solving. Repeatable This course may be repeated up to seven times.

## ICL 3000 - Principles of Teaching

**Credit Hours:** (3) **Description:** Research practices and application of principles of instruction that promote effective teaching and facilitate cognition. **PREREQUISITE:** EDPR 2111, LEAD 2010.

## ICL 3001 - Know/Learn/Math/Science

**Credit Hours:** (3) **Description:** Focus on issues of what it means to learn and know science and mathematics; includes critical examination of the needs of a diverse student population; discussion of current issues in education, especially as related to mathematics and science education. Enrollment limited to students in the Tigers Teach program.

## ICL 3002 - Classroom Interactions

**Credit Hours:** (3) **Description:** Focus on teaching and learning in mathematics and science; includes introduction to ways in which curriculum and technology are effectively used in classroom settings; examines equity in mathematics and science. **PREREQUISITE:** INTD 1020, 1021, and ICL 3001. **COREQUISITE:** ICL 3003.

#### ICL 3003 - Pract Secondary Math/Science

**Credit Hours:** (1) **Description:** Extended field experiences involving observation and teaching in high school mathematics and science classrooms. **PREREQUISITE:** INTD 1020, 1021, ICL 3001. **COREQUISITE:** ICL 3002.

## ICL 3333 - Stdnt Assess/Inst Dec Mkng

**Credit Hours:** (3) **Description:** Examination of aspects and types of classroom assessments, with particular interest on formative assessment, and the subsequent use of assessment results to improve student learning. **PREREQUISITE:** admission to TEP.

## ICL 3901 - Special Problems Instruction

1247 **Credit Hours:** (1-6) **Description:** Supervised individual investigation in area of instruction. **PREREQUISITE:** experience as teacher or satisfactory evidence of being qualified to benefit from course.

## ICL 4001 - Teaching/Diverse Environment

**Credit Hours:** (3) **Description:** Teacher candidates develop appropriate knowledge and skills for managing the total learning environment in school settings; emphasis on developing skills that facilitate effective teaching through appropriate management techniques that are sensitive to the individual needs of students within culturally and economically diverse population, and that encourage the involvement of parents and community members.

## ICL 4002 - Fndmtl/Urban Mid Grade Ed

**Credit Hours:** (3) **Description:** Teacher candidates develop knowledge of best practices for middle grades learning and cognition; identify, develop, and evaluate strategies and techniques of instruction that are sensitive to individual needs of children within a culturally and economically diverse population. Emphasis on planning, instruction, assessment, and professional development. Clinical/field experiences: additional hours required. **PREREQUISITE:** Admission to TEP.

## ICL 4003 - Teach Mid School Language Arts

**Credit Hours:** (3) **Description:** Principles, techniques, materials for teaching language arts in middle grades. Additional hours of field experience required. (F) **PREREQUISITE:** Admission to TEP.

#### ICL 4004 - Teach Mid Grade/Math

**Credit Hours:** (3) **Description:** Instructional techniques, curriculum and materials for teaching mathematics to middle school students with emphasis on problem solving. Clinical/field Experience: additional field hours are required. (F) **PREREQUISITE:** Admission to TEP.

#### ICL 4005 - Teach Mid Grade/Science

**Credit Hours:** (3) **Description:** Instruction in principles, techniques, and materials for teaching relationships among science, technology, and society, for the middle grades students. Additional field hours are required. (F) **PREREQUISITE:** Admission to TEP.

## ICL 4006 - Teach Mid Grade/Social Science

**Credit Hours:** (3) **Description:** Instructional strategies and assessment procedures relevant to teaching social studies to students in the middle grades. Emphasis will be placed on how to address the National Council of Social Studies Standards with middle school students. Clinical/field Experience: additional field hours are required. (F) **PREREQUISITE:** Admission to TEP.

## ICL 4007 - Curriculum/Instr Sec Math

**Credit Hours:** (3) **Description:** Examination of research-based instructional approaches in secondary mathematics; investigation of mathematics curriculum standards and curricular materials. **PREREQUISITE:** Admission to TEP.

#### ICL 4008 - Teaching Math in Urban Schools

**Credit Hours:** (3) **Description:** Examination of equity and opportunity to learn mathematics in urban schools; history of mathematics education; culturally relevant pedagogy and teaching linguistically diverse students. **PREREQUISITE:** admission to TEP.

## ICL 4020 - Language/Comm/Diverse Classrm

**Credit Hours:** (3) **Description:** Instruction for students with typical and exceptional communication needs; interpreting speech/language assessment reports and designing instruction; use of augmentative and alternative communication devices and working with non-native English speaking students. Field Hours: 8. **PREREQUISITE:** SPED 2000. **COREQUISITE:** ICL 4021, SPED 3800, ELED 3271, LITL 4241, admission to TEP.

## ICL 4021 - Professional/Ethical Practices

**Credit Hours:** (3) **Description:** Education policy and practice; accountability, ethics, advocacy. and social challenges; working with families and community stakeholders; instructional planning includes creating individual education plans, individual family plans and transition planning. **PREREQUISITE:** SPED 2000.

## ICL 4080 - Math Methods High School I

**Credit Hours:** (3) **Description:** Pedagogical content knowldege in secondary mathematics focusing on Functions and Statistics and Probability. **COREQUISITE:** MATH 4080.

#### ICL 4081 - Math Methods HS Teachers II

**Credit Hours:** (3) **Description:** Pedagogical content knowledge in secondary mathematics focusing on Functions and Statistics and Probability. **PREREQUISITE:** provisional TEP admission. **COREQUISITE:** MATH 4081.

## ICL 4121 - Library Materl Yng Peop/Adlts

**Credit Hours:** (3) **Description:** Evaluation and selection of books and related library materials for leisure interests and curriculum needs of young people and adults from junior high school up; extensive reading, introduction to selection criteria, bibliographic aids, authors and illustrators, and types of literature and information books.

## ICL 4450 - Indivilized Instrctn Practicum

**Credit Hours:** (1-3) **Description:** Implementation of instruction in individual and small group situations for learners experiencing difficulty in selected basic skills areas; requires design and delivery of

1248 tutorial type instruction under guidance of supervisory personnel. Repeatable May be repeated for maximum of 9 hours credit. (S/U)

# ICL 4701-4709 - Workshops in Curriculum and Instructional Leadership

**Credit Hours:** (1-9) **Description:** Various areas of curriculum and elements of instruction explored. Active student participation included. See online class listings for specific workshop number and topic. Repeatable May be repeated for a maximum of 9 hours credit in any one topic. (S/U)

## ICL 4715 - Clinical/Practicum

**Credit Hours:** (2) **Description:** Seminars and participation as assistant to classroom teacher; emphasis on teacher roles and on adapting subject discipline to school curriculum. **PREREQUISITE:** EDPR 2211, LEAD 2010. (S/U)

#### ICL 4716 - Project-Based Instruction

**Credit Hours:** (3) **Description:** Students master new technologies for project-based investigations in mathematics and science classrooms; use of assessment to improve student learning. Enrollment is limited to students in the Tigers Teach program. **PREREQUISITE:** ICL 3002, ICL 3003. **COREQUISITE:** ICL 4717.

## ICL 4717 - Pract in Project-Based Instruc

**Credit Hours:** (3) **Description:** Extended field experiences involving observation and teaching in high school mathematics and science classrooms. Field experiences focus on the implementation of Project-Based Instruction. **PREREQUISITE:** ICL 3002, ICL 3003. **COREQUISITE:** ICL 4716.

#### ICL 4761 - Aerospace Ed in Schools

**Credit Hours:** (3) **Description:** Aerospace content and flight experiences. Emphasizes classroom application.

#### ICL 4762 - Adv Aerospace Ed in Schools

**Credit Hours:** (3) **Description:** Theory, principles and practices related to historical development of aerospace; emphasis on both civilian and military uses of aerospace capabilities. Appropriate utilization of aerospace research, concepts, and "spinoffs" for instructional purposes in the classroom at all grade levels. **PREREQUISITE:** ICL 4761.

## ICL 4800 - Residency II Prof Seminar

**Credit Hours:** (3) **Description:** Seminar taken concurrently with Residency II; focus on the capstone assessment (edTPA) as well as analyzing and solving issues encountered during the Residency; focus on assisting teacher candidates in developing their expertise as professional educators. Successful completion of capstone assessment required. **PREREQUISITE:** Full admission to TEP, passing all required licensure exams. **COREQUISITE:** ICL 4904.

## ICL 4901 - Student Teach/Early Child

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4902 - Clinical Residency II/ECED

**Credit Hours:** (9) **Description:** Full-time planned placement appropriate to candidate's area of licensure providing opportunities to demonstrate competencies associated with successful teaching and student achievement. Capstone performance assessment requirement for successful completion. **PREREQUISITE:** admission to the Residency, approval from Director of Teacher Education, and passing all required licensure exams. **COREQUISITE:** ICL 4800.

#### ICL 4904 - Residency II Clinical

**Credit Hours:** (9) **Description:** Full-time clinical placement appropriate to candidate's area of licensure providing opportunities to demonstrate professional competencies associated with successful teaching and student achievement. Capstone performance assessment required for successful completion. **PREREQUISITE:** admission to TEP and passing all required licensure exams. **COREQUISITE:** ICL 4800.

#### ICL 4906 - Teaching All Learners

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4907 - Stdnt Tchng/Secondary School

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4908 - Student Teaching/Health

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting.

1249 **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4909 - Student Teaching/Phys Ed

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4910 - Stdnt Tchng/Voc Home Ec

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4911 - Student Teaching in Music

**Credit Hours:** (2-10) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational setting. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** ICL 4800. (S/U)

#### ICL 4913 - Clinical Residency II/Mid Grds

**Credit Hours:** (9) **Description:** Full-time clinical placement appropriate to candidate's area of licendure providing opportunities to demonstrate professional competencies associated with successful teaching and student achievement. Capstone performance assessment required for successful completion. **PREREQUISITE:** admission to the Residency, approval of Director of Teacher Education, and passing all required licensure exams. **COREQUISITE:** ICL 4800.

#### ICL 4914 - Residency I Practicum

**Credit Hours:** (5) **Description:** An in-depth clinical experience designed to provide teacher candidates an opportunity to experience all aspects of being a professional educator. Candidates will be placed in partner schools for the entire first week of school and for multiple days each week of semester. **PREREQUISITE:** admission to TEP and passing appropriate Praxis II content knowledge exam. **COREQUISITE:** course work by licensure area with approval from advisor.

# ICL 4950-4959 - Special Topics in Instruction and Curriculum Leadership

**Credit Hours:** (1-3) **Description:** Current topics in areas of curriculum and instruction at all levels. Topics are varied an in online class listings.

## ICL 4960 - Academic Content for Teaching

**Credit Hours:** (1-9) **Description:** Academic content areas in disciplines supportive of school curriculum. Repeatable May be repeated to remove deficits for teacher licensure and with change of content.

## ICL 4999 - Experiential Learning Credit

**Credit Hours:** (1-30) **Description:** Experiential learning credit (ELC) is a highly individualized process whereby students can use the learning outcomes that they have earned through a broad range of out of classroom experiences before admittance to the University of Memphis to petition for college credit.

## IDT 3600 - Technology in Education

**Credit Hours:** (3) **Description:** Integration of varied uses of technology into classroom learning environments while increasing students' technological knowledge and skills; word processing, spreadsheets, authoring; Internet tools and resources, presentation, communication, collaboration. Additional field experience hours required.

# INTL 1101 - Introduction to International and Global Studies

**Credit Hours:** (3) **Description:** An interdisciplinary exploration of economic, human, cultural, and political dimensions of globalization. **[G]** 

# INTL 3700-3709 - Special Topics in International and Global Studies

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings. Open to all students.

# INTL 4601 - Seminar in International and Global Studies

**Credit Hours:** (3) **Description:** Investigation of selected topics in international and global studies from interdisciplinary perspective. Individual research and presentation of major paper that integrates tools, data or concepts of two or more disciplines and spans two or more countries. **PREREQUISITE:** permission of Director of International and Global Studies.

# INTL 4911 - Internship in International and Global Studies

**Credit Hours:** (1-6) **Description:** Practical experience in an international organization. Students placed with governmental or private organization to obtain practical experience in foreign policy making, problems of development, and/or cross-cultural communication. Academic credit granted upon certification of

cooperating agency and acceptance by faculty of written report by student. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of Director of International and Global Studies.

#### INTL 4912 - Directed Individual Study

**Credit Hours:** (1-6) **Description:** Individually directed advanced reading and/or research in special areas of interest. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of Director of International and Global Studies.

## ITAL 1010 - Elementary Italian I

**Credit Hours:** (3) **Description:** Basic skills fundamental to language proficiency and culture.

## ITAL 1020 - Elementary Italian II

**Credit Hours:** (3) **Description:** Further development of basic skills fundamental to language proficiency and culture. **PREREQUISITE:** ITAL 1010, or equivalent.

## ITAL 2010 - Intermediate Italian I

**Credit Hours:** (3) **Description:** Comprehensive review of basic grammar, exercises in conversation, writing, and cultural readings. **PREREQUISITE:** ITAL 1020 or equivalent.

## ITAL 2020 - Intermediate Italian II

**Credit Hours:** (3) **Description:** Continued development of basic language skills through oral and written practice. **PREREQUISITE:** ITAL 2010, or equivalent.

## ITAL 3301 - Conversation/Composition I

**Credit Hours:** (3) **Description:** Development of oral proficiency and writing skills. **PREREQUISITE:** ITAL 2020, or equivalent.

#### ITAL 3302 - Conversation/Composition II

**Credit Hours:** (3) **Description:** Continued development of oral proficiency and writing skills. **PREREQUISITE:** ITAL 3301, or permission of instructor.

## ITAL 3311 - Adv Conversation/Composition I

**Credit Hours:** (3) **Description:** Designed to develop strong conversational and listening skills; includes wide variety of activities and exposure to native conversational speed; selected readings to help expand vocabulary. **PREREQUISITE:** ITAL 3301 or permission of instructor.

# ITAL 3312 - Adv Conversation/Composition II

**Credit Hours:** (3) **Description:** Continued development of strong conversational and listening skills; includes wide variety of activities and exposure to native conversational speed; selected readings to help expand vocabulary. **PREREQUISITE:** ITAL 3301 or permission of instructor.

#### ITAL 3411 - Intro to Italian Literature

**Credit Hours:** (3) **Description:** Survey of major literary works from the Middle Ages to the present. **PREREQUISITE:** ITAL 3301 or permission of instructor.

## ITAL 3900 - Italian Culture and Society

**Credit Hours:** (3-6) **Description:** Intensive language and culture; travel to an Italian speaking country required. **PREREQUISITE:** permission of study abroad director.

## ITAL 4401 - Business Italian

**Credit Hours:** (3) **Description:** Enhancement of the student's Italian language skills for use in a business context. **PREREQUISITE:** ITAL 2020

#### ITAL 4441 - Dante

**Credit Hours:** (3) **Description:** Study of the Vita Nuova and the Divina Commedia. Students taking this course do not receive credit for LALI 4441. **PREREQUISITE:** ITAL 2020, or permission of instructor.

#### ITAL 4780 - Indiv Studies Italian

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of Italian chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

## ITAL 4791-4799 - Special Topics in Italian Literature, Language, and Civilization

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

#### JAPN 1010 - Elementary Japanese I

**Credit Hours:** (3) **Description:** Basic skills fundamental to language proficiency and culture.

#### JAPN 1020 - Elementary Japanese II

**Credit Hours:** (3) **Description:** Further development of basic skills fundamental to language proficiency and culture. **PREREQUISITE:** JAPN 1010, or equivalent.

#### JAPN 2010 - Intermediate Japanese I

**Credit Hours:** (3) **Description:** Continued development of listening, speaking, reading and writing skills. **PREREQUISITE:** JAPN 1020, or equivalent.

#### JAPN 2020 - Intermediate Japanese II

**Credit Hours:** (3) **Description:** Expansion of Japanese skills with more extensive listening comprehension practice and readings. **PREREQUISITE:** JAPN 2010, or equivalent.

#### JAPN 3301 - Conversation and Composition I

**Credit Hours:** (3) **Description:** Development of pre-advanced language skills and oral and written communication skills. **PREREQUISITE:** JAPN 2020, or equivalent.

#### JAPN 3302 - Conversation and Composition II

**Credit Hours:** (3) **Description:** Expansion of pre-advanced language skills and oral and written communication skills. **PREREQUISITE:** JAPN 3301, or equivalent.

#### JAPN 3401 - Intro to Japanese Literature

**Credit Hours:** (3) **Description:** Japanese literature and culture through a selection of important literary works. **PREREQUISITE or COREQUISITE:** JAPN 3301, or equivalent.

#### JAPN 3402 - Readings/JAPN Culture

**Credit Hours:** (3) **Description:** Continued development of cultural competencies and language skills for professional purposes through a wide range of primary reading materials such as newspaper articles, comic books, biographies, and essays. **PREREQUISITE or COREQUISITE:** JAPN 3301 or equivalent.

#### JAPN 3500 - Japanese Writing System

**Credit Hours:** (3) **Description:** This course introduces the characteristics of the Japanese writing system and their communicative functions in contemporary Japanese. The students will analyze how the four types of Japanese scripts had developed and are used in texts in various genres, such as in social and news media, manga, and literature. The course also focuses on how best to learn and retain kanji characters. **PREREQUISITE:** JAPN 2020 or equivalent

#### JAPN 3900 - Japan Culture/Society

**Credit Hours:** (3-6) **Description:** Intensive language and culture course; travel to Japanese speaking country required. **PREREQUISITE:** permission of study abroad director.

## JAPN 4401 - Advanced Japanese I

**Credit Hours:** (3) **Description:** Advanced development of language skills (speaking, listening, reading, and writing) and cultural knowledge. **PREREQUISITE:** JAPN 3302 or permission of instructor.

#### JAPN 4402 - Advanced Japanese II

**Credit Hours:** (3) **Description:** Continuation of JAPN 4401. Further development of advanced language and cultural skills. **PREREQUISITE:** JAPN 4401 or permission of instructor.

#### **JAPN 4501 - Japanese Linguistics**

**Credit Hours:** (3) **Description:** Theory and hands-on data analysis in various aspects of Japanese linguistics, including syntax, semantics, and pragmatics. **PREREQUISITE or COREQUISITE:** JAPN 3301 or equivalent

#### JAPN 4701 - Japn/Professional Purpose I

**Credit Hours:** (3) **PREREQUISITE:** JAPN 3302 or permission of instructor.

#### JAPN 4702 - Japn/Professional Purposes II

**Credit Hours:** (3) **PREREQUISITE:** JAPN 3302 or permission of instructor.

#### JAPN 4780 - Individual Study in Japanese

**Credit Hours:** (1-3) **Description:** Directed individual study in selected area of Japanese chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# JAPN 4791-4799 - Special Topics in Japanese Language, Culture or Literature

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

#### JOUR 3120 - Reporting

**Credit Hours:** (3) **Description:** Writing and reporting news and feature stories using both traditional and new media techniques with an emphasis on developing sources and advanced skills. Fee \$35 per credit hour **PREREQUISITE:** JRSM 2121.

#### JOUR 3130 - Feature Writing/Reporting \*\*

**Credit Hours:** (3) **Description:** Advanced practice in writing, reporting and publishing feature stories for print and online, along with freelance techniques and advanced writing techniques with emphasis on leads, story endings, descriptive writing, and effective use of

1252 anecdotes. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3120 or JOUR 3629 or PBRL 3421 and JOUR 3526.

#### JOUR 3526 - Multimedia Storytelling

**Credit Hours:** (3) **Description:** Understanding the photograph and video as narrative through photojournalism techniques; learning to see, interpret and capture images that communicate information and have meaning and storytelling power; editing of digital images and video with software for use in broadcast, web and print; legal and ethical issues in photography. Fee \$35/credit hour One lecture hour, four laboratory hours per week. **PREREQUISITE:** JRSM 2121. JRSM 3900 or JRSM 3905.

#### JOUR 3629 - Broadcast Reporting

**Credit Hours:** (3) **Description:** This course provides an introduction to radio and television newswriting style and formats, as well as the basics of reporting necessary to broadcast journalism. It is an applied course, with a strong emphasis on developing and practicing writing skills. Students will demonstrate knowledge of the community and news events within it. Fee \$35 per credit hour **PREREQUISITE:** JRSM 2121

#### JOUR 4124 - Data Writing/Reporting

**Credit Hours:** (3) **Description:** Advanced use of computer technology and investigative techniques to access, analyze and develop database information in combination with traditional news reporting. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

#### JOUR 4150 - Sports Writing/Reporting

**Credit Hours:** (3) **Description:** Development of advanced writing, reporting and professional skills specific to sports media; emphasis on practice of game reporting, feature stories, column and opinion writing and multimedia. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

#### JOUR 4155 - Multimedia Sports Reporting

**Credit Hours:** (3) **Description:** Furthers student's reporting, writing, shooting and other professional skills specific to sports media from breaking news to features and in-depth stories across a range of digital platforms. Fee \$35 per credit hour **PREREQUISITE:** JOUR 4150.

#### JOUR 4160 - Food Writing/Reporting

**Credit Hours:** (3) **Description:** Addresses specialized niche of food writing by producing stories, both long and short form, and developing new media content for a class food blog. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

#### JOUR 4170 - Business Writing/Reporting

**Credit Hours:** (3) **Description:** Introduction to business writing and reporting and to the opportunities and issues in this growing field. Focuses on covering companies, the people who work for them, and the consumers of their goods and services along with issues of the economy, finance and the stock market. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

## JOUR 4180 - Public Issues Writing/Reporting

**Credit Hours:** (3) **Description:** Emphasis placed on deadline writing and critiquing of political and public policy news. Encourages familiarity with the methods and insights of political and social science and develops confidence to use those methods and insights in reporting. Encourages use of social media to cover and explain campaigns and policy. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

## JOUR 4190 - Opinion Writing/Reporting

**Credit Hours:** (3) **Description:** Principles and practices for wellresearched and well-written editorials, columns, op-ed submissions, broadcast commentaries and long form analysis perspective pieces; thorough examination of the purpose and impact of opinion journalism on readers, political leaders, policy makers and society at large. Fee \$35 per credit hour **PREREQUISITE:** JOUR 3526. JOUR 3120 or JOUR 3629.

## JOUR 4530 - Innovative Storytelling Techniques

**Credit Hours:** (3) **Description:** The course offers advanced instruction, training, practice and analysis in multi-platform journalism, including audio, video, and social media. The course will also focus on effective use of various media platforms to tell stories in a modern media environment. The topic of the course will be set each semester by the instructor. Fee \$35 per credit hour Repeatable May be repeated for a maximum of six hours when topics vary. **PREREQUISITE:** JRSM 2121 and JOUR 3526

## JOUR 4629 - TV News Writing/Reporting

**Credit Hours:** (3) **Description:** Gathering, writing and presentation of news for television. Students will shoot, write, edit, and voice packages for use in both the reporting and producing classes. **PREREQUISITE:** JOUR 3120 and JOUR 3526.

## JOUR 4639 - TV News Producing

**Credit Hours:** (3) **Description:** Producing, writing, editing and using electronic equipment to assemble a television newscast; emphasis on performing the various tasks in a working newsroom. **PREREQUISITE:** JOUR 4629. Permission of Department required for registration.

#### JOUR 4830 - Directed Indiv Study \*\*

**Credit Hours:** (1-3) **Description:** Independent study and research, or practicum, or project under supervision. Repeatable May be repeated

for a maximum of 3 hours credit. **PREREQUISITE:** permission of instructor.

1253

## JOUR 4998 - Multimedia News Lab

Credit Hours: (3)

#### **Description:**

Write, produce content for an online news publication that will house multimedia stories on important, complex topics in the city of Memphis; course will mirror collaborative opportunities underway in industry and provide students with the strongest multimedia material possible for portfolios.

**PREREQUISITE:** Pick two of the following: JOUR 3130, JOUR 4124, JOUR 4160, JOUR 4170, JOUR 4180, JOUR 4190, JOUR 4629. *Cross listing:* NA

#### JRSM 1700 - Intro to Media \*\*

**Credit Hours:** (3) **Description:** Social background, scope, functions, and organization of modern communication media, attention to all major mass communication media; philosophy and goals of modern journalism; impact on governmental, social and economic systems. **[G]** 

High Impact Practice Code: Study Abroad

## JRSM 1750 - Precision Language \*\*

**Credit Hours:** (3) **Description:** Introduction to grammar and writing style for use in journalism and mass communication media; foundations of research and information gathering, media literacy, and plagiarism.

#### JRSM 1800 - Intro to Radio

**Credit Hours:** (3) **Description:** Introduction to production and performance skills required for basic work in radio. In addition to receiving lab training and instruction, all students will complete regular shifts at the campus radio station.

#### **JRSM 1950 - Experiential Learning**

**Credit Hours:** (3) **Former:** () **Description:** Credit given for work completed outside of the classroom prior to admittance to the University of Memphis. NOTE: Presentation of portfolio work activity required. [S/U]

## JRSM 2121 - Media Writing \*\*

**Credit Hours:** (3) **Description:** Basic instruction in journalistic forms and AP style; information gathering and composition of news stories; media literacy. Fee \$35/credit hour One lecture hour, four laboratory hours per week. **PREREQUISITE:** JRSM 1750. *Cross listing:* NA

#### JRSM 3900 - Visual Media \*\*

**Credit Hours:** (3) **Description:** Introduction to and application of principles of visual communication, including typography, color and organization for print and digital media using Adobe Creative Cloud. Fee \$35/credit hour One lecture hour, four laboratory hours per week. **No** *Cross listing:* NA

#### JRSM 3905 - Graphics for Strategic Media

**Credit Hours:** (3) **Description:** Practices of development of social media graphics, flyers, brochures and other collateral materials using Adobe Spark, Canva and other Web-based tools. Fee \$35 per credit hour

#### **JRSM 3950 - Experiential Learning Credit**

**Credit Hours:** (1-30) **Former:** JOUR 3950 **Description:** Credit given for work completed outside the classroom prior to admittance to the University of Memphis. Presentation of portfolio representative of work activity required. (S/U).

#### JRSM 4102 - Entrepreneurial Media

**Credit Hours:** (3) **Description:** Examines business models and new media tools that can encourage entrepreneurial thinking and planning in various fields of mass communication, as well as the theory and practices of traditional media management. Topics include assessment, organization and strategy, budgeting, decision-making, and other functions in advertising, news, and public relations.

#### JRSM 4700 - Media Law \*\*

**Credit Hours:** (3) **Description:** Origin and development of legal principles affecting freedom of expression and provisions of laws of libel, slander, copyright, and other statutes limiting communication in fields of publishing and broadcasting. **PREREQUISITE:** Student must have earned 60 credit hours.

#### JRSM 4702 - Media, Diversity & Society \*\*

**Credit Hours:** (3) **Description:** Advanced study of critical problems faced by mass media, with exploration of complexities that cause them.

#### JRSM 4704 - Issues in Sport and Media

**Credit Hours:** (3) **Description:** Examines the ongoing relationship of sports and media. Students will think more critically about the role of sports in the contemporary media landscape and vice-versa.

#### JRSM 4708 - Media Ethics

**Credit Hours:** (3) **Description:** Classical approaches to ethics presented with their application to the day-to-day considerations journalism, public relations and advertising professionals must face in working with employers, local publics and the larger society which depends on a free flow of accurate information.

#### JRSM 4716 - Media History

**Credit Hours:** (3) **Description:** Major events, stories, personalities, and issues shaping development of mass communication with special emphasis on the history of American journalism, from advent of printing to the age of the Internet.

#### JRSM 4720 - Presidents and the Press

**Credit Hours:** (3) **Description:** Conflict and symbiosis between the White House and the news media; studies of history, journalism, and politics; how various presidents used or failed to use the media, how they were covered and represented, and how that relationship has changed over the years.

# JRSM 4800-4809 - Special Topics in Journalism and Strategic Media

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing.

#### JRSM 4910 - Social Media and Society\*\*

**Credit Hours:** (3) **Description:** Discussion of social media's impact on individuals, organizations, and society. Examines the fundamentals of social media-based community, diversity, and influence. Includes broad understanding of a variety of platforms and trends and their place and importance in the social media ecosystem.

#### JRSM 4930 - Media Internship \*\*

**Credit Hours:** (3) **Description:** Work under supervision of qualified mass media practitioner. Student must work 50 hours per credit hour. NOTE: Students may earn no more than 6 hours of credit for JRSM 4930 or JRSM 4940 in combination. **PREREQUISITE:** Permit required and must have earned 45 credit hours. (S/U)

#### JRSM 4940 - Student Media Practicum

**Credit Hours:** (1-3) **Description:** Work in practical assignments at student media organizations. Students must work at least 50 hours per credit hour. Repeatable up to 6 credits hours. NOTE: Students may earn no more than 6 hours of credit for JRSM 4930 or JRSM 4940 in combination. **PREREQUISITE:** Permit required and must have earned 45 credit hours. (S/U)

#### JDST 2850 - Religions of Abraham

**Credit Hours:** (3) **Former:** (UNIV) **Description:** Survey of development of several Near Eastern religious traditions; consideration of intellectual relationships among them. **[G]** 

JDST 3601 - Judaism

**Credit Hours:** (3) **Description:** Fundamental principles of Judaism, its role in the cultural life of the Jewish people, and its influence on human civilization.

#### JDST 3661 - Perspectives on the Old Testament

**Credit Hours:** (3) **Description:** Interdisciplinary examination of portions of Hebrew Bible, Mishnah, Midrash, and other texts along with commentaries. All texts will be read in translation. *Cross listing:* (Same as LALI 3661)

## JDST 3801 - Ancient & Medieval Jewish Thought

**Credit Hours:** (3) **Description:** Thinkers and texts that shaped Jewish thought and life in ancient and medieval times; Talmud, the Midrash, the Kabbalah, and such thinkers as Saadia Gaon, Solomon ibn Gabriel, Judah Halevi, Maiminides.

## JDST 3802 - Modern Jewish Thought

**Credit Hours:** (3) **Description:** Continuation of JDST 3801, from 16th century until modern times; concepts of God, humanity, nature, good and evil, making meaning out of life, and others.

#### JDST 4511 - Holocaust Studies

**Credit Hours:** (3) **Description:** Interdisciplinary study of issues that arise out of the Holocaust; questions of good and evil, divinity and humanity, truth and responsibility. [W, I] *Cross listing:* (Same as UNIV 4511).

#### JDST 4671 - Jewish Literary Texts

**Credit Hours:** (3) **Description:** Development of Jewish narrative traditions; Jewish poetry, fiction, drama studied from perspectives of different national cultures in which Jewish literature has emerged. All texts will be read in translation.

#### JDST 4700-4799 - Special Topics

**Credit Hours:** (1-3) **Description:** Examination of selected topics announced in the online class listing.

#### JDST 4801 - Jewish Mysticism

**Credit Hours:** (3) **Description:** Fundamental principles of Jewish mystical tradition; development of basic concepts; medieval mysticism, Kabbalah, Lurianic mysticism, Chasidism, modern mystical movements.

#### JDST 4820 - Political History of Israel

**Credit Hours:** (3) **Description:** Interdisciplinary study of political stages in the development of the State of Israel, from mid 19th century to current times, with particular attention paid to key figures in the Zionist movement. *Cross listing:* (Same as POLS 4820)

#### JDST 4830 - Israeli/Arab Conflict

**Credit Hours:** (3) **Description:** Interdisciplinary examination of historical, political, and cultural dimensions of tensions that have existed between the Israelis and Arabs since the founding of the State of Israel, with particular attention to current situation. *Cross listing:* (Same as UNIV 4830).

#### JDST 4900 - Independent Study

**Credit Hours:** (3) **Description:** Directed individual study or research. Repeatable May be repeated once. **PREREQUISITE:** Completion of out-of-class learning contract and approval of director of Bornblum Judaic Studies.

#### KORE 1010 - Elementary Korean I

**Credit Hours:** (3) **Description:** Principles of pronunciation; everyday expressions; basic sentence patterns through oral practice, writing and reading.

#### KORE 1020 - Elementary Korean II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** KORE 1010 or equivalent

#### KORE 2010 - Intermediate Korean I

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** KORE 1020 or equivalent

## KORE 2020 - Intermediate Korean II

**Credit Hours:** (3) **Description:** Continued study of sentence patterns through oral and written practice. **PREREQUISITE:** KORE 2010 or equivalent

## LALI 1010 - Special Foreign Lang I

**Credit Hours:** (3) **Description:** Freshman level instruction in languages not regularly offered by Department of Foreign Languages; offered if and when sufficient demand exists and instructors available. Although credit earned in LALI 1020-LALI 2020 may be used to satisfy foreign language requirements for degrees, students should be aware of two important points: (1) foreign language requirement for degrees in College of Arts and Sciences specifies that all hours must be in same language; (2) unless demand is sufficient and unless instructors are available, the University cannot offer enough courses to enable students to meet these requirements.

## LALI 1020 - Special Foreign Lang II

Attion paid to key figures in the arme as POLS 4820) The online catalog can be accessed at: http://catalog.memphis.edu/index.php Foreign Languages; offered if and when sufficient demand exists and instructors available.

# LALI 2010 - Intermediate Foreign Lang I

**Credit Hours:** (3) **Description:** Continuation of LALI 1010 and LALI 1020. Offered provided instructor is available and there is sufficient student enrollment.

# LALI 2020 - Intermediate Foreign Lang II

**Credit Hours:** (3) **Description:** Continuation of LALI 2010. Offered provided instructor is available and there is sufficient student enrollment.

# LALI 3661 - Old Testament

**Credit Hours:** (3) **Description:** Disciplines of history, philosophy, literature, religion, and culture; understanding the meanings, messages, and world views contained in sacred Hebrew texts. *Cross listing:* (Same as JDST 3661).

## LALI 4010-4029 - Special Topics in Foreign Literatures

**Credit Hours:** (3) **Description:** Topics vary and are announced in the online class listing.

#### LALI 4441 - Dante

**Credit Hours:** (3) **Description:** Study of the Vita Nuova and the Divine Comedy in English translation.

## LALI 4442 - Italian Cinema

**Credit Hours:** (3) **Description:** Screening and discussion of major Italian movies in context of 20th and early 21st century Italian culture and society.

# LALI 4493 - Contemporary French Lit

**Credit Hours:** (3) **Description:** Emphasis on widely translated, well-known works by major French writers; presented in English translation.

# LALI 4500 - Japanese Culture and Society

**Credit Hours:** (3) **Description:** Study of Japanese culture through hands-on activities along with reading and creating media resources on traditional, popular, and business culture of Japan. Through critical reading of the materials and classroom activities, students will develop critical perspectives and deeper understanding of Japanese culture, its traditions, and social practices. Japanese language skills are not required.

# LALI 4780 - Individual Study Lang and Lit

1256 Credit Hours: (1-3) Description: Directed individual study in selected areas of language or literature chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. PREREQUISITE: permission of instructor.

## LALI 4791-4799 - Special Topics in Foreign Literature, Language, or Civilization

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

## LATN 1010 - Elementary Latin I

**Credit Hours:** (3) **Description:** Elements of grammar; practice in Latin composition and translation.

## LATN 1020 - Elementary Latin II

**Credit Hours:** (3) **Description:** Completion of elementary Latin grammar, with additional readings. **PREREQUISITE:** LATN 1010, or equivalent college level credit.

## LATN 2010 - Intermediate Latin I

**Credit Hours:** (3) **Description:** Review of basic Latin grammar with reading selections from The Golden Fleece and Roman history. **PREREQUISITE:** LATN 1020, or the equivalent.

#### LATN 2020 - Intermediate Latin II

**Credit Hours:** (3) **Description:** More advanced readings from major authors. **PREREQUISITE:** LATN 2010, or equivalent.

#### LATN 4001 - Latin Prose

**Credit Hours:** (3) **Description:** Reading, interpretation of original texts of one or more Latin prose authors; language, structure and content. Repeatable May be repeated for a maximum of 9 credit hours. **PREREQUISITE:** LATN 2020.

#### LATN 4002 - Latin Poetry

**Credit Hours:** (3) **Description:** Reading, interpretation of original texts of one or more major Latin poets; language, structure and context. Repeatable May be repeated for a maximum of 9 credit hours. **PREREQUISITE:** LATN 2020.

## LEAD 2010 - Foundations/American Education

**Credit Hours:** (3) **Description:** Introduction to roles and responsibilities of teachers in urban school settings; evolution of educational policies and practices; organization and structure of schools; examination of schools as cultural systems; philosophical, historical, and legal approaches; field experience (5 hours). **PREREQUISITE:** sophomore standing.

#### LEAD 3350 - The Adult Learner

**Credit Hours:** (3) **Description:** Variety of learning patterns and developmental characteristics of adult emphasis on applications in programs or other activities for adult learners.

## LEAD 4000 - Education/School/Amer Society

**Credit Hours:** (3) **Description:** Interdisciplinary study of educational policies and practices in American society; role and function of school and teachers; analysis of major problems and issues facing contemporary public education. Five hours of school visitation required. **PREREQUISITE:** upper division standing or bachelor's degree.

## LEAD 4044 - SPED Law for Educators

**Credit Hours:** (3) **Description:** Legal foundations of special education; analytical tools for competent decision-making at school level. Designed for teachers, principals, school administrators, parents, special education advocates. **PREREQUISITE:** LEAD 2010 or SPED 2000, or permission of instructor.

## LEGL 2400 - Legal Ethics

**Credit Hours:** (3) **Description:** Introduction to paralegal profession; organization of legal institutions; role of attorneys and paralegals in legal system; regulation, ethics, and professional responsibility. **PREREQUISITE:** ENGL 1010.

#### LEGL 2410 - Intro to Law

**Credit Hours:** (3) **Description:** Introduction to American substantive and procedural law; origins and applications of legal theories and processes; case law analysis. **PREREQUISITE:** ENGL 1010.

## LEGL 3150 - Legal Research/Writing I

**Credit Hours:** (3) **Former:** (Was 2420) **Description:** Introduction to legal research methods and citation using case reporters, code books, and secondary sources; legal writing with focus on drafting a civil complaint and initiating litigation. **PREREQUISITE:** ENGL 1010 and ENGL 1020.

## LEGL 3400 - Estates and Probates

**Credit Hours:** (3) **Description:** Laws, regulations, customs, ethics, and practical realities of estate management. The course covers decedents? estates (probate law, wills, trusts, intestate succession) as well as estate management for those who are legally incapacitated (conservatorships and guardianships). **PREREQUISITE:** LEGL 2400 and LEGL 2410.

#### LEGL 3410 - Contracts Commercial Law

**Credit Hours:** (3) **Description:** Survey of law affecting the formation, performance, and enforcement of contracts; the Uniform Commercial Code; consumer protection; debtor-creditor relations; and bankruptcy; emphasis on paralegal's role in contract and commercial cases. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 3420 - Torts

**Credit Hours:** (3) **Description:** Survey of state and federal law treating civil injury to persons or property; common law and statutory torts, worker's compensation, and insurance; emphasis on paralegal's role in preparing personal injury and compensation cases. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

#### LEGL 3430 - Business Associations

**Credit Hours:** (3) **Description:** Legal aspects of formation and operation of proprietorships, agencies, partnerships, and corporations; emphasis on paralegal's role in drafting business documents and maintaining corporate records.

## LEGL 3440 - Civil Procedure

**Credit Hours:** (3) **Description:** Application of Rules of Civil Procedure to civil litigation in federal and state courts; jurisdiction; pleadings; discovery requests; trial and appellate practices; judgments; emphasis on paralegal's role in civil litigation. **PREREQUISITE:** LEGL 2400, LEGL 2410, LEGL 3150.

## LEGL 3481 - Family Law

**Credit Hours:** (3) **Description:** Substantive and procedural law affecting the family; marriage; procreation; divorce; child custody and support; emphasis on Tennessee law and paralegal's role in family cases. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 3482 - Labor Law

**Credit Hours:** (3) **Description:** Law affecting employment relations; NLRB and EEOC procedures; OSHA and ADA issues in the workplace; emphasis on paralegal's role in labor law cases. **PREREQUISITE:** LEGL 2400, LEGL 2410, 2420 and LEGL 3483.

#### LEGL 3483 - Computers in Law

**Credit Hours:** (3) **Description:** Detailed examination of practical, technical, and theoretical aspects of computer systems as applied in the modern law office; includes docket control, billing, communications, litigation support, and legal document production. **PREREQUISITE:** ENGL 1010 and ENGL 1020. **COREQUISITE:** LEGL 2420. Course offered in online format only.

## LEGL 3484 - Bankruptcy Practices

**Credit Hours:** (3) **Description:** Intensive study of substantive and procedural law of bankruptcy; emphasis on applications and processes

used by the paralegal when assisting in bankruptcy cases. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 3485 - Real Estate Practices

**Credit Hours:** (3) **Description:** Substantive law of real property; acquisitions, characteristics, and transfer of interests in real estate; particular emphasis on the role of paralegals assisting real estate attorneys with realty transfers and closings in Shelby County, Tennessee. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 3486 - Criminal Law & Procedure

**Credit Hours:** (3) **Description:** Advanced approach to understanding substantive and procedural criminal law with emphasis on practical application; prima facie elements of substantive criminal offenses, defenses to specific crimes, constitutional limits on police and other governmental entities, probation and parole, and the juvenile justice system. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 3487 - Admin Law/Procedure

**Credit Hours:** (3) **Description:** Advanced approach to understanding substantive administrative law with in-depth analysis of Administrative Procedure Act; agency rulemaking, investigations, due process, informal action and discretion, formal adjudications, judicial review. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

## LEGL 4000 - Evidence and Argument

**Credit Hours:** (3) **Description:** What is evidence? What makes it compelling? When does compelling evidence become unfair? This course examines the role of evidence to substantiate arguments not only in courts of law but also in social discourse, policy debates, and the court of public opinion. Starting with the Federal Rules of Evidence, we explore factors like relevance, hearsay, credibility, and probative value. How do those factors affect persuasive dialogue both within and beyond the legal sphere? **PREREQUISITE:** ENGL 1010 and ENGL 1020.

## LEGL 4010-4015 - Special Topics in Legal Studies

**Credit Hours:** (3) **Description:** Topics vary by semester. See online class schedule listing.

## LEGL 4150 - Legal Research Writing II

**Credit Hours:** (3) **Former:** (Was 3450) **Description:** Continued study of legal research and writing methods with a focus on the discovery phase of litigation and internet-based research using Lexis-Nexis and Westlaw. **PREREQUISITE:** LEGL 3150.

## LEGL 4200 - Healthcare Liability

1258 **Credit Hours:** (3) **Description:** Interplay between modern health care and tort liability; medical malpractice claims, defenses, and damages; tort reform; pre-suit requirements; concepts of agency and vicarious liability; expert witnesses; discovery and presentation of medical evidence; and ethical dilemmas of health care litigation. **PREREQUISITE:** LEGL 2400, LEGL 2410, and LEGL 3150.

#### LEGL 4300 - Immigration Law

**Credit Hours:** (3) **Description:** Phenomenon of immigration in the United States from a legal perspective. Readings and projects expose students to the different ways in which immigration is regulated by legislatures, administrative agencies, and courts. **PREREQUISITE:** LEGL 2400 and LEGL 2410.

## LITL 3001 - Literacy Tutoring

**Credit Hours:** (3) **Description:** Designed for students to teach literacy to school-aged children in clinical K-12 schools or non-profit settings. Repeatable May be repeated for a maximum of 9 hours credit. May not be repeated to improve grade. **PREREQUISITE:** restricted to University Honors Students or Education Students seeking licensure, and permission of instructor. *Cross listing:* (Same as UNHP 3001).

## LITL 4240 - Literacy in Grades K-4

**Credit Hours:** (3) **Former:** (ELED) **Description:** Offers a socioconstructivist perspective on theory and pedagogy as related to materials and methods of teaching; assessing listening, speaking. beginning reading and writing, and thinking. Field Hours: Additional field experiences hours required.

## LITL 4241 - Literacy in Grades 4-8

**Credit Hours:** (3) **Former:** (ELED) **Description:** Instructional strategies and assessment procedures relevant to the acquisition of reading, speaking, listening, writing, and thinking skills for students in the middle grades. Field hours required. **PREREQUISITE:** Admission to TEP and LITL 4240.

## MGMT 1010 - Intro to Business

**Credit Hours:** (3) **Description:** Overview of practices applicable for addressing the personal and professional development challenges of business and entrepreneurship; introduction to elementary concepts of business; orientation toward selection of major and information on business career opportunities. NOTE: if taken by students with 50 credit hours or more, credit will not count for the B.B.A. degree.

## MGMT 1812 - Life Skills: Personal Development/Change Management

**Credit Hours:** (3) **Description:** Provides students with a framwork for self-motivation and action as well as an understanding of individual impact on others while employing change management strategies. Students will learn how to balance multiple priorities, the importance of

personal choices, effective problem-solving and decision-making techniques, and the necessity of perserverance.

## MGMT 2811 - Field Experience in Business

**Credit Hours:** (3) **Description:** Faculty-directed field experience; students will work a minimum of 125 hours during the semester with a local organization to develop a business project under the workplace supervisor. Requires end-of-course project reflecting the activities of the experience as well as the learning from participation in a professional development program. Open only to BBA Management or International Business majors. **PREREQUISITE:** completion of 30 credit hours, minimum cumulative 2.75 GPA, and 9 hours of business courses.

## MGMT 2820 - Intro to Entrepreneurship \*\*

**Credit Hours:** (3) **Description:** This course is designed to empower students to think globally; identify distinct competencies locally; develop a personal mission statement; explain individual pathways by some of the leading entrepreneurs; identify opportunities for aspiring entrepreneurs; eliminate roadblocks to creativity; create outline to launch your own business.

## MGMT 2900 - Experiential Learning Credit

**Credit Hours:** (1-9) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Lower-division credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course ELC 3900.

#### MGMT 3110 - Organization and Mgmt \*\*

**Credit Hours:** (3) **Description:** Comprehensive survey of basic management concepts, principles, and function; coverage in planning, organizing, leading and controlling organizational resources to achieve objectives; overview of decision-making within the context of organizational global environment, strategy, organizational structures, culture, human capital, ethics and corporate social responsibility and performance.

# MGMT 3215 - Management of Human Resources

**Credit Hours:** (3) **Description:** Human resources as a strategic competitive advantage; human resource functions including recruiting, staffing, training, development, performance management, total compensation, employee relations, unions, workplace safety and health, and employee retention; impact of legal context on human resources.

#### MGMT 3510 - Business Communications \*\*

**Credit Hours:** (3) **Description:** Communication theory applied to business and the professions; emphasis on effective writing; employment messages, and selection and use of research sources for

written and oral reports; use of technology to facilitate the communication process and document preparation; consideration of business ethics, interpersonal, nonverbal and intercultural communication. **PREREQUISITE:** MIS 2749, or equivalent.

#### MGMT 3812 - Managing Employee Wellness \*\*

**Credit Hours:** (3) **Description:** Overview of employee wellness programs, their impact on employee retention, productivity, healthcare costs, and other critical organizational outcomes; emphasis on the importance of personal health, legal and human behavior issues of employee wellness program implementation, and the development of an organizational culture of health. **PREREQUISITE:** MGMT 3110.

#### MGMT 3900 - Experiential Learning Credit

**Credit Hours:** (1-9) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Upperdivision credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course ELC 3900.

# MGMT 4110-4119 - Special Topics in Management.

**Credit Hours:** (3) **Description:** Topics varied and in online class listings. **PREREQUISITE:** permission of instructor.

# MGMT 4240 - Compensation Performance Appraisal \*\*

**Credit Hours:** (3) **Description:** Examination of the administration of compensation and performance management systems; use of job descriptions, job analysis, and job evaluation methods; employee benefits administration; global issues in compensation and performance management. **PREREQUISITE:** MGMT 3110, MGMT 3215, MGMT 3510.

#### MGMT 4251 - Employee Relations \*\*

**Credit Hours:** (3) **Description:** Theories and practices in employee relations and manager's role in building and maintaining positive employee relationships; development of skills in conflict resolution and negotiation in human resource and management context; understanding labor unions, union organizing, and collective bargaining process; examination of ethical and legal issues relevant to employee relations. **PREREQUISITE:** MGMT 3110, MGMT 3215, MGMT 3510.

## MGMT 4260 - Employee Staffing/Training/Development \*\*

**Credit Hours:** (3) **Description:** Examination of the process of strategic recruitment, selection, training, and development of top talent in organizations; understanding and planning for talent needs, use of current recruitment methods and selection techniques of both internal and external talent pools, and the training and development of internal

talent for retention and promotion. Legal context of employment decision-making is emphasized. **PREREQUISITE:** MGMT 3110, MGMT 3215, MGMT 3510. *Cross listing:* 

# MGMT 4420 - Organizational Behavior in Business \*\*

**Credit Hours:** (3) **Description:** Evidence-based learning of individual and group behavior and processes in order to improve organizational effectiveness and efficiency; emphasis is placed on the systematic study of personality, work attitudes and motivation, groups and team processes, leadership and organization structure and design. **PREREQUISITE:** MGMT 3110, MGMT 3510.

## MGMT 4461 - Managerial Leadership \*\*

**Credit Hours:** (3) **Description:** Examination of leadership in business organizations; critical evaluation of the meaning and practice of leadership; coverage of philosophy, psychology, process and outcomes of leadership; individual perspective of self-leadership. **PREREQUISITE:** MGMT 3110, MGMT 3510

# MGMT 4481 - Teamwork/Group Dynamics in Organizations

**Credit Hours:** (3) **Description:** Process of group dynamics in organizations and development of groups into high performing teams; emphasis on most effective context for team formation; selection process of team members and roles these members play in team's success; development of individual and team competencies; managing conflict within a team; particular challenges that necessary utilization of virtual and dispersed teams pose to organizational performance. **PREREQUISITE:** MGMT 3110 and MGMT 3510.

## MGMT 4510 - International Business Communication \*\*

**Credit Hours:** (3) **Description:** Importance of business communication in conducting global business effectively; emphasis on organizational and interpersonal communication as well as negotiation skills needed in an integrated world economy; culture-based assumptions, contrasting cultural values, communication and negotiation strategies, verbal and nonverbal patterns, cultural shock, and country specific information. **PREREQUISITE:** MGMT 3510.

## MGMT 4710 - Strategic Management \*\*

**Credit Hours:** (3) **Description:** Advanced problems in determination, execution, and control of strategic management process in light of changing environments in which organizations operate.

**PREREQUISITE:** MGMT 3110, MGMT 3510, and senior standing in The Fogelman College of Business and Economics. Enrollment limited to graduating seniors.

## MGMT 4810 - International Management \*\*

1260 Credit Hours: (3) Description: Introduction of management practices, concepts, and functions within the international and cultural environment; coverage of managing within the context of social, cultural, legal, economic, political, and technological constraints; ethics and social responsibility, sustainability, cross-cultural decision making and negotiation, strategy, systems of operation, staffing global operations, organizational structures, and performance. PREREQUISITE: MGMT 3110, MGMT 3510.

#### MGMT 4820 - Advanced Entrepreneurship \*\*

**Credit Hours:** (3) **Description:** Initiation process of new business venture. Students participate in individual and team activities to acquaint them with opportunities and skills needed for business initiation and development. **PREREQUISITE:** MGMT 3110 or MGMT 2820.

#### MGMT 4910 - Independent Study Management \*\*

**Credit Hours:** (1-3) **Description:** Student conducts an approved research project in the Management area under the supervision of a faculty member. Variable credit hours 1 to 3. **PREREQUISITE:** Senior standing and permission of department chair.

#### MGMT 4911 - Internship In Mgmt \*\*

**Credit Hours:** (1-6) **Description:** Internship in business organization to gain on-the-job experience. Three hours credit normally awarded. Credit is awarded based on learning content of the experience. Placement to be approved and supervised by departmental faculty. Credit allowed upon acceptance of final portfolio. **PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

## MGMT 4920 - Independent Study in Entrepreneurship

**Credit Hours:** (1-3) **Description:** Student conducts approved research or a project in student's chosen area of entrepreneurial activity under the supervision of a faculty member and, preferably, in consultation with an entrepreneur or team. Student must participate in an approved entrepreneurship/incubator/accelerator competition, i.e., held by the Crews Ventures Lab. Variable credit hours 1 to 3. **PREREQUISITE:** Senior standing and permission of department chair.

#### MGMT 4921 - Internship in Entrepreneurship

**Credit Hours:** (1-6) **Description:** Internship in an entrepreneurial setting to gain on-the-job experience. Project to be approved and supervised by departmental faculty. Credit allowed upon acceptance of final portfolio. **PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

## **MGMT 4996 - Senior Honors Thesis**

**Credit Hours:** (3) **Description:** Independent research open only to those students enrolled in the Honors Program. Thesis supervised by departmental faculty member. **PREREQUISITE:** senior standing and permission of the Director of the Honors Program.

# MIS 2749 - Foundation/Information Systems \*\*

**Credit Hours:** (3) **Description:** Introduction to major concepts in business information systems, including computer hardware, software, networks, databases, the Internet, and electronic commerce; emphasis on use of database and spreadsheet technologies to solve business problems.

High Impact Practice Code: Learning Community

# MIS 2845 - Applied Program Development I \*\*

**Credit Hours:** (3) **Former:** (3745) **Description:** Introduction to business application programming; program development using languages and techniques widely employed in business environment. **PREREQUISITE:** MIS 2749.

# **MIS 2900 - Field Experience**

**Credit Hours:** (9) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Lower division credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course.

# MIS 3210 - Critical Thinking Using Analytics \*\*

**Credit Hours:** (3) **Description:** Contemporary processes, methods, techniques, tools and datasets that organizations use to implement knowledge discovery projects; focus on development of critical thinking through use of in-depth assignments that utilize project management fundamentals. **PREREQUISITE:** lower division business core completed.

### MIS 3765 - E Commerce Business Applicatn

**Credit Hours:** (3) **Description:** Basic electronic commerce concepts applied within context of supply chain management. **PREREQUISITE:** MIS 2749.

### MIS 3770 - System Analysis Methods \*\*

**Credit Hours:** (3) **Description:** Overview of systems development life cycle; emphasis on current systems documentation through use of classical and structured tools and techniques for describing process flows and data flows, data structures, file and input/output design and program specifications, data gathering and information reporting activities, transition from analysis to design. **PREREQUISITE or COREQUISITE:** MIS 3210.

**Credit Hours:** (3) **Description:** Focus on designing programs written in a high-level language for business applications; selecting appropriate file organization; designing data models with electronic commerce implications; utilizing appropriate DBMS programs. **PREREQUISITE or COREQUISITE:** MIS 3210 or equivalent.

### MIS 3790 - Enterprise Architecture \*\*

**Credit Hours:** (3) **Description:** Design, selection, implementation and management of enterprise IT solutions; applications and infrastructure and its fit with business; strategies and frameworks for application portfolio and infrastructure management. **PREREQUISITE or COREQUISITE:** MIS 3210.

# MIS 3885 - Strategic IT Project Management \*\*

**Credit Hours:** (3) **Description:** Principles, process, tools of modern project management; general business project management and information technology specific project management; strategic implications of project management to organizational strategy; use of currently available project management software tools to successfully plan and execute projects. **PREREQUISITE:** MGMT 3110.

# MIS 3900 - Experiential Learning Credit

**Credit Hours:** (18) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Upperdivision credit determined by faculty assessor(s). **PREREQUISITE:** Satisfactory completion of the university's portfolio development course.

# MIS 4110-4119 - Special Topics in Management Information Systems

**Credit Hours:** (3) **Description:** Topics varied and announced in online class listings. **PREREQUISITE:** permission of instructor.

### **MIS 4160 - Mobile Application Development**

**Credit Hours:** (3) **Description:** Intermediate level business application program development using languages and techniques widely employed in business environment. **PREREQUISITE:** MIS 2845, or equivalent.

### MIS 4310 - Global Information Technology \*\*

**Credit Hours:** (3) **Description:** Technology to facilitate the practice of global business; uses of systems and technology to gain and sustain competitive advantage; cultural and political aspects of global enterprise.

# MIS 4321 - Global Outsourcing/Technology

**Credit Hours:** (3) **Description:** Technology development is increasingly outsourced to contract vendors, and it is no longer sufficient to understand how to develop technology or to manage service, operations or manufacturing processes domestically to be a successful and effective manager in modern industry. This course will focus on the competencies, skills and expertise required for the modern manager in the global marketplace to deploy and supervise outsourcing operations across international boundaries.

# MIS 4672 - Project Management Tools and Leadership \*\*

**Credit Hours:** (3) **Description:** Computer-based project management tools and project management leadership roles and techniques. **PREREQUISITE or COREQUISITE:** MIS 3885.

# MIS 4681 - Fundamental/Software Testing

**Credit Hours:** (3) **Description:** Software testing objectives, planning, techniques, and organizational options. Manual and auotmated software testing techniques and test case generation methodologies. **PREREQUISITE:** MIS 2845, MIS 3770.

# MIS 4682 - Advanced Software Testing

**Credit Hours:** (3) **Description:** Topics include advanced software testing methods, the roles of software testers and users at all stages of software development, walkthroughs, inspections, and reviews, testing in standard versus agile developments environments. **PREREQUISITE:** MIS 4681.

### MIS 4760 - Web Site Development \*\*

**Credit Hours:** (3) **Description:** Design, development, implementation and evaluation of business Web sites; global design and implementation issues. **PREREQUISITE:** MIS 2845.

### MIS 4800 - Strategy/Mgmt/Acquisition \*\*

**Credit Hours:** (3) **Description:** Explores acquisition, development, and implementation of plans and policies to achieve efficient and effective information systems; investigates issues and approaches in managing the IS function and how IS function supports and enables organizational capabilities and strategies. **PREREQUISITE:** MIS 3770, MIS 3775, MIS 3790.

### **MIS 4845 - Application Program Development III**

**Credit Hours:** (3) **Description:** Advanced programming of business applications using current high level languages and techniques widely employed in business environment. **PREREQUISITE:** MIS 2845, or equivalent.

### MIS 4910 - Management Information Systems Problems

**Credit Hours:** (1-3) **Description:** Approved research projects in student's major area under supervision of staff members. **PREREQUISITE:** senior standing and permission of department chair.

1262

# MIS 4911 - Internship in Management Information Systems

**Credit Hours:** (1-6) **Description:** Internship in business organization to gain on-the-job experience. Project approved and supervised by area faculty. Credit allowed only after acceptance of report. **PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

# MIS 4996 - Senior Honors Thesis/MIS

**Credit Hours:** (3) **Description:** Independent research open only to those students enrolled in the honors program. Thesis supervised by area faculty member. **PREREQUISITE:** senior standing and permission of the Director of the College Honors Program.

### MKTG 3010 - Principles of Marketing \*\*

**Credit Hours:** (3) **Description:** Comprehensive study of structure and functions of marketing system in the firm, economy, and society; analysis of target markets, environments, and managerial aspects of marketing practices; comprehensive overview of key components of product and service marketing including brand positioning, pricing, promoting, distribution and selling.

### MKTG 3012 - Consumer Behavior \*\*

**Credit Hours:** (3) **Description:** Why consumers behave as they do; the consumer decision process including internal and external influences, organizational buying, and marketing regulation. **PREREQUISITE:** MKTG 3010.

### MKTG 3140 - Advertising/Sales Promotion \*\*

**Credit Hours:** (3) **Description:** Introduction to field of advertising including the managerial aspects of brand building through the planning and execution of effective advertising and promotion; emphasis on advertising strategy and tactics including coordination of media and methods to deliver effective promotional mix. **PREREQUISITE:** MKTG 3010.

### MKTG 3320 - Retailing Management \*\*

**Credit Hours:** (3) **Description:** Changing concepts of retailing from management viewpoint; principles that underlie successful operation of enterprises distributing products and services to ultimate consumers. **PREREQUISITE:** MKTG 3010.

# MKTG 3340 - Principles of Social Media Marketing \*\*

**Credit Hours:** (3) **Description:** Introduces concepts of social media that augment and effect integrated marketing efforts; emphasis on integrated marketing communication, targeting, brand enhancement, engagement and monitoring effects on consumers, and basic analysis of social media marketing efforts.

# MKTG 3410 - Building Buyer/Seller Relationships

**Credit Hours:** (3) **Description:** Basics of selling skills; the partnership process, ethics, buying behavior, communications, building relationships, managing time, territory, and career with video situations and role playing self-observations.

### MKTG 4080 - Marketing Research \*\*

**Credit Hours:** (3) **Description:** Research methods and procedures used in marketing to solve business problems; traditional and innovative research designs, sampling, data analysis, dissemination of results; applications of analytical techniques; confidence intervals, hypothesis testing, correlation/regression, and analysis of variance; overview of research process used by organizations to deliver superior customer satisfaction and develop new products and services. **PREREQUISITE:** SCMS 3711 and MKTG 3010.

# MKTG 4230 - Services Marketing

**Credit Hours:** (3) **Description:** Broadens and applies marketing concepts and techniques in services industries and compares to tangible goods marketing.

### MKTG 4410 - Sales Management

**Credit Hours:** (3) **Description:** Sales management functions of recruiting and hiring, training and assimilating, planning, controlling and motivating, and sales analysis; role of personal selling in promotional mix and sales objectives of management. **PREREQUISITE:** MKTG 3010, MKTG 3410, and senior standing.

### MKTG 4411 - Sales Internship

**Credit Hours:** (1-6) **Description:** Internship in an organization to gain on-the-job sales or sales-related experience. Course offered by permit only. Permits obtained online and issued by the Fogelman Professional Development Center. Academic credit approval and the evaluation methods are determined by a MSCM faculty member. **PREREQUISITE:** MKTG 3410 and Junior or Senior standing.

# MKTG 4470 - Essentials of Negotiation \*\*

**Credit Hours:** (3) **Description:** Fundamental skills in negotiation process, including types, planning and strategies; emphasis on communication, relationships, cross-cultural, multiple parties, power, and ethics across a variety of settings.

### MKTG 4530 - International Marketing \*\*

**Credit Hours:** (3) **Description:** Understand how cultural, legal, political, infrastructure, and technological environments of developed versus developing and least developed economies impact international marketing: entry, branding, distribution, pricing, and communication strategy decisions to reduce marketing risk. Culminates in a student-developed foreign country international marketing launch plan. **PREREQUISITE:** MKTG 3010.

# MKTG 4550 - MKTG Business Solutions for Sustainability

**Credit Hours:** (3) **Description:** This course focuses on business solutions that balance ecological, economic, and social performance.

PREREQUISITE: MKTG 3010

# MKTG 4611 - Social Media Internship/Practicum

**Credit Hours:** (1-6) **Description:** Internship in an organization to gain on-the-job social media marketing experience. Course offered by permit only. Permits obtained online and issued by the Fogelman Professional Development Center. Academic credit approval and the evaluation methods are determined by a MSCM faculty member. **PREREQUISITE or COREQUISITE:** MKTG 4630 and Junior or Senior standing.

# MKTG 4630 - Social Media Strategies and Analytics

**Credit Hours:** (3) **Description:** Enhances basic knowledge of social media marketing to include advanced skills in social media marketing planning and analytics. Current software, tools, and techniques allow students to explore the implications, opportunities, and challenges of successful social media integration into marketing strategy. Case studies demonstrate the dynamics of social media marketing decision-making. **PREREQUISITE:** MKTG 3340.

# MKTG 4901 - Management of Marketing Strategies \*\*

**Credit Hours:** (3) **Description:** Comprehensive study of the development, implementation, and analysis of marketing strategies. Student should take in final semester. **PREREQUISITE:** MKTG 3012 and MKTG 4080.

### MKTG 4910 - Problems in Marketing

**Credit Hours:** (1-3) **Description:** Students carry on approved research projects in their major area under supervision of staff member. **PREREQUISITE:** senior standing and permission of department chair.

# MKTG 4911 - Marketing Internship

**Credit Hours:** (1-6) **Description:** Internship work in a company to gain on-the-job experience of learning; how marketing is used in a business. Project must be approved and supervised by a Marketing faculty member. Credit is allowed only after acceptance of the student and faculty member agreed evaluation method.

**PREREQUISITE:** Junior or Senior standing, 2.75 overall GPA or a minimum 3.0 GPA based on upper division business courses completed; completed a minimum of two major courses; and completed 15 hours of Upper Division business courses.

# MKTG 4920-4929 - Special Topics in Marketing

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated for a maximum of 6 hours credit with change in topic. **PREREQUISITE:** permission of department chair.

# MKTG 4996 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research open only to those students enrolled in the Honors Program. Thesis supervised by area faculty member. **PREREQUISITE:** senior standing and permission of the Director of the College Honors Program.

# MATH 1420 - Foundations of Mathematics \*\*

**Credit Hours:** (3) **Description:** Basic logic: propositions and truth values, recognizing fallacies, sets and Venn Diagrams, analyzing arguments; approaches to problem solving; managing finances: compound interest, savings plans and investments, loan payments, credit cards and mortgages; fundamentals of statistical reasoning. **PREREQUISITE:** MATH 1710 with a minimum grade of C- or an ACT MATH subscore of at least 17. Special sections of MATH 1420 Combo require an ACT MATH subscore of at least 15. **[G]** 

# MATH 1421 - Honors Calculus I

**Credit Hours:** (4) **Description:** Concepts of differential calculus with emphasis on theory; limits, continuous functions, applications of the derivative. NOTE: students may not receive credit for both MATH 1421 and MATH 1910. **PREREQUISITE:** permission of instructor and ACT MATH subscore of at least 29.

# MATH 1480 - Math/Elem School Teachers I

**Credit Hours:** (3) **Description:** Examination of mathematics taught in grades K-6 focusing on the Tennessee Academic Standards Domains of Counting and Cardinality, Operations and Algebraic Thinking, Number and Operations in Base 10, Number and Operations - Fractions, and Expressions and Equations. **PREREQUISITE:** MATH 1420 or MATH 1710 with a minimum grade of C-.

# MATH 1481 - Math/Elem School Teachers II

**Credit Hours:** (3) **Description:** Examination of mathematics taught in grades K-6 focusing on the Tennessee Academic Standards Domains of Ratios and Proportional Reasoning, Number System, Measurement and

1264 Data, Expressions and Equations, Geometry, and Statistics and Probability. **PREREQUISITE:** MATH 1480 with a minimum grade of C-.

# MATH 1530 - Prob/Statistics/Non Calculus\*\*

**Credit Hours:** (3) **Description:** Introduction to statistical literacy focusing on understanding such concepts as: sample surveys, observational studies, and experiments; methods of sampling; measures of central tendency and variation; graphical representations of data; basic concepts of probability; the normal distribution; basic principles of hypothesis testing; p-values; and correlation vs causation. NOTE: Math majors may not use this course as part of the major. **PREREQUISITE:** MATH 1710 with a minimum grade of C-, or an ACT MATH subscore of at least 15. **[G]** 

# MATH 1710 - College Algebra

#### **Credit Hours:** (3)

**Description:** Analysis of functions (linear, quadratic, polynomial, root, rational, exponential, logarithmic); partial fractions; conic sections; theory of equations; inequalities; applications.

NOTE: only one of MATH 1710 or MATH 1730 may be used to satisfy degree requirements

**PREREQUISITE:** An ACT MATH subscore of at least 20. Special Combo sections of MATH 1710 require an ACT MATH subscore of at least 18. MATH 1420 or 1420 Combo may serve as a pre-requisite for Math 1710 Combo. **[G]** 

# MATH 1720 - Trigonometry\*\*

**Credit Hours:** (3) **Former:** (1212) **Description:** Circular functions; inverse circular functions, graphs of circular and inverse functions, identities, equations, angles, trigonometric functions, solution of triangles, elementary application of vectors; trigonometric form of complex numbers. **PREREQUISITE:** MATH 1710 with a minimum grade of C- or an ACT MATH subscore of at least 24.

# MATH 1730 - Pre-Calculus\*\*

**Credit Hours:** (4) **Description:** Exponents, radicals, quadratic functions, inequalities; relations and functions; inverse, exponential and logarithmic functions; solution of algebraic systems; trigonometric functions, identities, equations and graphs; angle measurements; sum, difference, half-angle and double-angle formulas; solution of triangles, laws of sines and cosines. **PREREQUISITE:** MATH 1710 with a minimum grade of C- or an ACT MATH subscore of at least 24. **[G]** 

# MATH 1830 - Elementary Calculus\*\*

Credit Hours: (3) Description: Introduction to the concepts and methods of elementary calculus of one real variable as related to rational, exponential, and logarithmic functions; limits; differentiation and its applications to optimization in business and economics; growth and decay models; integration and its economic applications, including consumer and producer surplus. NOTE: only one of MATH 1830 or MATH 1910 may be used to satisfy degree requirements. PREREQUISITE: MATH 1710 or MATH 1730 with a minimum grade of C- or an ACT MATH subscore of at least 24. [G]

### MATH 1900 - Experience/Calculus

#### Credit Hours: (1)

Description: In-depth study of concepts introduced in MATH 1830 with focus on use of transcendental function. Students completing both MATH 1830 and 1900 will fulfill the required prerequisites for MATH 1920.

PREREOUISITE: MATH 1830 with a minimum grade of A-, and permission of instructor.

### MATH 1910 - Calculus I \*\*

#### Credit Hours: (4)

**Description:** Introduction to calculus of one real variable; limits; continuity; derivatives; applications of derivatives including Newton's method, graphing techniques, optimization, indeterminate forms and l'Hospital's rule; antiderivatives; includes transcendental functions. NOTE: only one of MATH 1830 or MATH 1910 may be used to satisfy degree requirements. Students may NOT receive credit for both MATH 1910 and MATH 1421.

PREREOUISITE: MATH 1720 or MATH 1730 with a minimum grade of C- or an ACT MATH subscore of at least 26. [G]

### MATH 1920 - Calculus II\*\*

#### Credit Hours: (4)

**Description:** Integration and applications of the definite integral; techniques of integration and improper integrals; curves defined by Parametric equations; arc length and surface area; polar coordinates; infinite series, Taylor and McLaurin series. NOTE: students may not receive credit for both MATH 1920 and MATH 2421.

**PREREQUISITE:** MATH 1910 or MATH 1421 with a minimum grade of C- or both MATH 1830 with a minimum grade of A- and MATH 1900 with a minimum grade of C-.

Credit Hours: (1-3) Description: Topics are varied and in online class listings. **PREREQUISITE:** permission of instructor.

#### MATH 2110 - Calculus III\*\*

Credit Hours: (4) Description: Multivariable calculus including threedimensional analytic geometry and vectors, quadratic surfaces, arc length and curvature, limits and continuity, partial derivatives and their applications, tangent planes, optimization problems and Lagrange multipliers, multiple integrals, vector fields, line and surface integrals, Green's theorem, Stokes' theorem, the divergence theorem. PREREQUISITE: MATH 1920 with a minimum grade of C-, or MATH 2421 with a minimum grade of C-.

# MATH 2120 - Differential Equations\*\*

Credit Hours: (3) Description: Introduction to ordinary differential equations; first order differential equations; linear differential equations of all orders; series methods for linear equations; Laplace transform; systems of differential equations; applications. PREREQUISITE: MATH 1920 with a minimum grade of C- or MATH 2421 with a minimum grade of C-.

### MATH 2421 - Honors Calculus II

#### Credit Hours: (4)

Description: Differential and integral calculus with emphasis on theory; anti-derivatives, definite integrals, techniques of integration, sequences, and series. NOTE: Students may not receive credit for both MATH 2421 and MATH 1920. PREREQUISITE: MATH 1421 with a minimum grade of C- or MATH 1910 with a minimum grade of Cand permission of instructor.

### MATH 2422 - Honors Calculus III

Credit Hours: (4) Description: Multivariable calculus with emphasis on theory: three-dimensional analytic geometry, quadratic surfaces, arc length and curvature, limits and continuity, partial derivatives and their applications, tangent planes, optimization problems and Lagrange multipliers, multiple integrals, vector fields, line and surface integrals, Green's theorem, Stokes' theorem, and the divergence theorem. NOTE: Students may not receive credit for both MATH 2422 and MATH 2110. PREREOUISITE: MATH 2421 with a minimum grade of C-, or MATH 1920 with a minimum grade of C- and permission of instructor.

### MATH 2702 - Intro Proof/Fundamental Math

Credit Hours: (3)

Description: Logic, algebra of sets; forms of proof including mathematical induction; elementary combinatorics and binomial theorem; paradoxes, basic number theory, cardinality.

# MATH 3221 - Elementary Number Theory

**Credit Hours:** (3)

**Description:** Divisibility properties of integers; prime numbers; congruences; Diophantine equations; quadratic residues; number theoretic functions; Fermat's theorem and Euler's generalization; applications to cryptography; quadratic reciprocity law.

**PREREQUISITE:** MATH 3242 with a minimum grade of C-, or MATH 2702 with a minimum grade of C-, or COMP 2700 with a minimum grade of C- or permission of instructor.

# MATH 3242 - Intro Linear Algebra

**Credit Hours:** (3)

**Description:** Systems of linear equations, matrices, elementary row and column operations, determinants; vector spaces and subspaces; linear transformations.

**PREREQUISITE:** MATH 2110 with a minimum grade of C-, or MATH 1920 with a minimum grade of C- and either MATH 2702 with a minimum grade of C- or COMP 2700 with a minimum grade of C- or permission of instructor.

### MATH 3402 - Honors Mathematics IV

**Credit Hours:** (4) **Description:** Linear algebra and differential equations: vector spaces, bases, linear transformations, matrices, first and second order ordinary differential equations, systems, phase plane methods. NOTE: students with credit for this course cannot receive credit for MATH 3242 or MATH 2120. **PREREQUISITE:** MATH 2422 with a minimum grade of C-.

# MATH 3410 - Honors Seminar in Math I

Credit Hours: (1)

**Description:** Exploration of the origin and evolution of important mathematical ideas through examination of the lives and work of famous mathematicians.

**PREREQUISITE or COREQUISITE:** Enrollment in one of the Honors Calculus courses (MATH 1421, MATH 2421, MATH 2422, or

## MATH 3411 - Honors Seminar in Math II

Credit Hours: (1)

**Description:** Investigation of major topics in field of mathematics, such as Fundamental Theorem of Arithmetic, Prime Number Theorem, van der Waerden's Theorem and nowhere differentiable functions.

**PREREQUISITE or COREQUISITE:** Enrollment in one of the Honors Calculus courses (MATH 1421, MATH 2421, MATH 2422, or MATH 3402), or admission to departmental or University Honors Program, or permission of instructor.

# MATH 3581 - College Geometry

#### Credit Hours: (3)

**Description:** Postulates and propositions from Euclidean geometry, other results from both classical and modern geometry, projective and other non-Euclidean geometries, analytic geometry, isometries (rigid motions).

**PREREQUISITE:** MATH 1910 with a minimum grade of C- and one of MATH 2702 with a minimum grade of C-, or COMP 2700 with a minimum grade of C-.

# MATH 4010-4019 - Special Topics in Mathematics and Statistics

**Credit Hours:** (1-3) **Description:** Topics are varied and announced in online class listings. **PREREQUISITE:** Permission of instructor.

### MATH 4020 - Actuarial Mathematics

**Credit Hours:** (3) **Description:** Preparation for SOA Exam P, CAS Exam 1. Conditional probability, dependence, combinatorial principles, random variables, discrete and continuous probability distributions, expectation, marginal distributions, risk management concepts. **COREQUISITE:** MATH 4635.

# MATH 4050 - Transformational Geometry

#### $\label{eq:credit Hours: (3)} \textbf{Credit Hours: (3)}$

**Description:** Study of Euclidean geometry based on the Erlangen Program. The course develops Euclidean geometry based on metric axioms, develops isometries, similarities, symmetry groups. This development is then reversed as isometries and similarities are then used to define Euclidean geometry. This transformational approach is then used to develop several topics including the nine point circle, the Euler line, the orthic triangle, the Fermat point, the Napoleon tessellation, the Circle of Apollonius, ornamental groups, Rosetta groups, frieze groups, and wallpaper groups.

Credit earned for this course cannot be applied to the Mathematical Sciences major. **PREREQUISITE:** Department Permit Required.

# MATH 4051 - Postsecondary Proof Methods

**Credit Hours:** (3) **Description:** Enhance mathematical communication skills by learning methods to prove inductive statements, statements about size, and statements about relationships among objects using the language of functions and relations. Credit earned for this course may not be applied toward requirements for the Mathematical Sciences major. **PREREQUISITE:** Permission of instructor.

#### MATH 4080 - Math/Sec School Teachers I

**Credit Hours:** (3) **Description:** Examination of mathematics taught in grades 9-12 focusing on the Tennessee Academic Standards conceptual categories of Number and Quantity and Algebra. Credit earned for this course may not be applied toward requirements for the Mathematical Sciences major. **PREREQUISITE:** MATH 4082 with a minimum grade of C-. **COREQUISITE:** ICL 4080.

#### MATH 4081 - Math/Sec School Teachers II

**Credit Hours:** (3) **Description:** Examination of mathematics taught in grades 9-12 focusing on the Tennessee Academic Standards conceptual categories of Functions and Statistics and Probability. Credit earned for this course may not be applied toward requirements for the Mathematical Sciences major. **PREREQUISITE:** MATH 4080 with a minimum grade of C-. **COREQUISITE:** ICL 4081

### MATH 4082 - Math/Mid School Teacher

#### Credit Hours: (3)

**Description:** Examination of mathematics taught in grades 7 and 8 focusing on the Tennessee Academic Standards Domains of Ratios and Proportional Reasoning, Number System, Functions, Expressions and Equations, and Statistics and Probability. Credit earned for this course may not be applied toward requirements for the Mathematical Sciences major. **PREREQUISITE:** Permission of instructor. **COREQUISITE:** ICL 4004.

### MATH 4083 - Dynamical Systems/Chaos

#### Credit Hours: (3)

**Description:** Examples of dynamic systems, one dimensional maps (periodic points, stability of fixed points, sensitivity dependence on initial conditions), two dimensional maps (sinks, sources and saddles, linear and nonlinear maps, Julia and Mandelbrot sets), chaos (Lyapunov exponents, chaotic orbits, basins of attraction), fractals (probabilistic and deterministic constructions, fractal dimension),

1267 differential equations (one and higher dimensional linear equations, periodic orbits and limit sets).

#### COREQUISITE: MATH 2120 or MATH 3242.

#### MATH 4084 - Introduction to Graph Theory

**Credit Hours:** (3) **Description:** Applications, connectivity, trees, paths and cycles, factors, matching and coverings, vertex and edge colorings, planar graphs, directed graphs, max-flow min-cut theorem, basic algorithms. **PREREQUISITE:** MATH 2702 with a minimum grade of C- or COMP 2700 with a minimum grade of C-.

### MATH 4085 - Introduction to Combinatorics

**Credit Hours:** (3) **Description:** Combinations and permutations, counting techniques, recurrence relations, generating functions, block designs, finite planes, and coding theory. **PREREQUISITE:** MATH 2702 with a minimum grade of C- or COMP 2700 with a minimum grade of C-.

#### MATH 4086 - Analytic Number Theory

#### Credit Hours: (3)

**Description:** Partial summation, Euler-Maclaurin summation formula, basic arithmetic functions and their mean values; Dirichlet series, Euler products; Meilin function and prime number theorem; characters and primes in arithmetic progressions, basic sieve methods.

PREREQUISITE: MATH 3221 with a minimum grade of C-.

#### COREQUISITE: MATH 4361

### MATH 4120 - Ordinary Differential Equations

#### Credit Hours: (3)

**Description:** Existence and uniqueness of solutions, phase plane analysis, continuous dependence on data, stability by Lyapunov's methods, matrix exponentials, periodic solutions, invariance principle, Poincare-Bendixson theorem, applications.

**PREREQUISITE:** MATH 2120 with a minimum grade of C- and MATH 3242 with a minimum grade of C-; or permission of instructor.

### MATH 4151 - History of Mathematics

Credit Hours: (3)

**Description:** Development of mathematics from earliest times to present; problem studies.

**PREREQUISITE:** 21 hours in MATH courses including MATH 2110 with a minimum grade of C- and one of MATH 2702 with a minimum grade of C- or COMP 2700with a minimum grade of C-.

### MATH 4171 - Special Problems in Math

Credit Hours: (1-3)

**Description:** Directed individual study in a selected area of mathematics.

Repeatable for a maximum of 3 credit hours by permission of Chair of the Department. **PREREQUISITE:** Permission of instructor.

# MATH 4242 - Linear Algebra

**Credit Hours:** (3) **Description:** Linear transformations, polynomials, determinants, direct-sum decompositions, diagonalizable operators, rational and Jordan forms, inner product spaces, spectral theorem. **PREREQUISITE:** MATH 3242 with a minimum grade of C-.

# MATH 4261 - Abstract Algebra

**Credit Hours:** (3) **Description:** Groups; homomorphisms; rings; integral domains; polynomials; fields. **PREREQUISITE:** MATH 2702 with a minimum grade of C- and MATH 3242 with a minimum grade of C- or permission of instructor.

# MATH 4350 - Intro Real Analysis I

**Credit Hours:** (3) **Description:** Real number system, functions and sequences, limits, continuity, differentiation, Riemann-Stieltjes integration, series of functions. **PREREQUISITE:** MATH 2110 with a minimum grade of C-, MATH 2702 with a minimum grade of C- and MATH 3242 with a minimum grade of C-.

# MATH 4351 - Intro Real Analysis II

**Credit Hours:** (3) **Description:** Integration theory, Riemann and Lebesgue integrals, partial differentiation, and implicit function theorem. **PREREQUISITE:** MATH 4350with a minimum grade of C- or permission of instructor.

### MATH 4361 - Complex Variables

**Credit Hours:** (3) **Description:** Complex numbers; analytic functions; Cauchy-Riemann conditions; Taylor and Laurent series; integration. **PREREQUISITE:** MATH 2110 with a minimum grade of C-.

### MATH 4391 - Partial Differential Eqns I

**Credit Hours:** (3) **Description:** Laplace transforms; Fourier series; introduction to partial differential equations. **PREREQUISITE:** MATH 2120 with a minimum grade of C-.

#### MATH 4392 - Partial Differential Eqns II

**Credit Hours:** (3) **Description:** Methods of characteristics; Green's functions; existence and regularity of solutions of boundary value; Cauchy problems. **PREREQUISITE:** MATH 4391 with a minimum grade of C-.

#### MATH 4396 - Perturbation Methods

**Credit Hours:** (3) **Description:** Asymptotic approximations, boundary layers, matched asymptotic expansions, multiple scales, geometric optics approximation (WKB), homogenization, application to differential equations. **PREREQUISITE:** MATH 2110 with a minimum grade of C- and MATH 2120 with a minimum grade of C-.

# MATH 4402 - Honors Thesis Seminar

#### Credit Hours: (3)

**Description:** In-depth study of one or more topics in mathematical sciences; emphasis on individual research and problem-solving techniques.

**PREREQUISITE:** Open only to senior Honors Students in Mathematical Sciences with permission of instructor.

# MATH 4411 - Topology

**Credit Hours:** (3) **Description:** Basic set theory; metric spaces; topological spaces; continuous functions; separation axioms; separability and countability axioms; connectedness and compactness. **PREREQUISITE:** MATH 2702 with a minimum grade of C- and either MATH 3242 with a minimum grade of C- or MATH 4350 with a minimum grade of C-.

# MATH 4607 - Intro SAS Programming

Credit Hours: (3)

**Description:** SAS program statement syntax and flow control; selecting and summarizing observations; combing, dividing and updating SAS dataset; input tailoring and output customization; SAS built-in functions, SAS/IML matrix programming language and SAS statistical packages such as SAS/UNIVARIATE, FREQ, TABULATE, SAS/CHART, PLOT and SAS/REG, GLM, CORR, NPAR1WAY. **PREREQUISITE:** Introductory course in statistics.

MATH 4608 - R for Data Proc and Visual

**Credit Hours:** (3) **Description:** Introductory course in the use of R programming language for data processing, visualization, and analysis of data. **PREREQUISITE:** MATH 3242 with a minimum grade of C-. Any experience with computer programming languages is useful but not required.

# MATH 4611 - Intro Applied Statistics

**Credit Hours:** (3) **Description:** Binomial, hypergeometric, Poisson, multinomial and normal distributions, tests of hypotheses, chi-square test, t-test. F-test, nonparametric tests; correlation analysis. Credit earned for this course may not be applied toward requirements for the Mathematical Sciences major. Students who have a calculus background are encouraged to take MATH 4635 instead of this course. **PREREQUISITE:** 6 hours in mathematics at level of MATH 1710 or above.

# MATH 4614 - Probability/Statistics

**Credit Hours:** (3) **Description:** Basic definition of probability functions; common discrete and continuous distributions; maximum likelihood and methods of moments estimation; basic concepts of hypothesis testing; comparisons of two population means, proportion, and variances; simple linear models. NOTE: Students may not receive credit for both MATH 4614 and MATH 4635. **PREREQUISITE:** MATH 2110 with a minimum grade of C- or MATH 1920 with a minimum grade of C- or COMP 2700 with a minimum grade of C- or permission of instructor.

# MATH 4635 - Intro Probability Theory

**Credit Hours:** (3) **Description:** Definition and properties of probability functions; random variables, moment generating functions; mean, variance and higher moments; discrete distributions; binomial hypergeometric, Poisson, geometric, negative binomial; continuous distributions; uniform, exponential, gamma, normal, Cauchy, chi-square, t, and F distributions; central limit theorem; functions of a random variable; bivariate, marginal, and conditional distributions and covariance. NOTE: Students may not receive credit for both MATH 4614 and MATH 4635. **PREREQUISITE:** MATH 1920 with a minimum grade of C-.

# MATH 4636 - Intro Statistical Theory

**Credit Hours:** (3) **Description:** Functions of two random variables; gamma, beta, multinomial, and bivariate normal distributions; Bayes estimators; maximum likelihood and methods of moments estimators; sufficient statistics, unbiasedness, confidence intervals, and hypothesis testing. **PREREQUISITE:** MATH 4635 with a minimum grade of C-.

# MATH 4637 - Stat Analysis/App Big Data

**Credit Hours:** (3) **Description:** Introduction to statistical modeling and analysis with some applications to big data. Topics include: linear models-regression, analysis of variance, multiple comparisons, shrinkage methods, and model checking; dimension reduction methods;

1269 discriminant analysis and clustering; and Bayesian modeling and computation. NOTE: Some knowledge of programming useful but not required. **COREQUISITE:** MATH 4614 or MATH 4636

### MATH 4640 - Intro Probability Models

**Credit Hours:** (3) **Description:** Introduction to Markov chains; limiting probabilities, branching processes, applications to modeling population growth and spread of infectious diseases; counting and poisson processes; continuous-time Markov chains, birth and death processes, applications to queuing models. **PREREQUISITE:** MATH 4635 with a minimum grade of C-.

# MATH 4643 - Intro Regression/Time Ser Anyl

#### Credit Hours: (3)

**Description:** Hypothesis testing and confidence intervals for linear regression models, examination of residuals, calculation of elasticities and partial correlations, heteroscedasticity, serial correlation, multi-colinearity, non-linearity, deterministic and stochastic time series models, stationary time series and autocorrelation functions, diagnostic checks, forecasting using ARIMA models.

PREREQUISITE: MATH 4636 with a minimum grade of C-.

# MATH 4685 - Statistical Learning I

**Credit Hours:** (3) **Description:** Introduction to statistical foundations of computational tools for modeling and understanding big data. Emphasis is on application to real data sets. Topics include linear regression, shrinkage methods, classification algorithms, principal component analysis, support vector algorithms, clustering methods, and ethical aspects of statistical learning. **PREREQUISITE:** MATH 3242 with a minimum grade of C- and either MATH 4614 with a minimum grade of C-, or MATH 4635 with a minimum grade of C-, or with permission of instructor.

# MATH 4686 - Statistical Learning II

**Credit Hours:** (3) **Description:** Statistical foundations of computerbased tools used in the modeling and analysis of big data. Emphasis is on application of Bayesian methods to real data sets. Topics include cross-validation, Bayesian inference and computation, non-parametric methods, and ethical aspects of statistical learning. **PREREQUISITE:** MATH 4685 with a minimum grade of C-, or permission of the instructor.

# MATH 4692 - Exp. in Data Science

#### Credit Hours: (3)

**Description:** A capstone course designed to fuse the core concepts and skills from computer science and the mathematical sciences learned throughout the data science program. Computational, analytic,

interpretive and communication skills will be used to design and execute a full data science project. The course will be co-taught by computer science and mathematical sciences.

**PREREQUISITE:** Permission of the instructors.

# MATH 4721 - Numerical Analysis

**Credit Hours:** (3) **Description:** Derivation and application of computer-oriented, numerical methods for functional approximation, differentiation, quadrature, and solution of ordinary differential equations. **PREREQUISITE:** MATH 2120 with a minimum grade of C- and MATH 3242 with a minimum grade of C- and knowledge of some structured programming language.

# **MECH 1310 - Intro/Mechanical Engineering**

**Credit Hours:** (2) **Description:** Introduction to the profession, the design process, professional ethics, engineering communications, societal impact of the profession; acquisition, organization, display, and analysis of data for engineering application. **PREREQUISITE:** MATH 1710 with a grade of C- or better. **COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910.

# MECH 1312 - Mech Engr Computing I

**Credit Hours:** (2) **Description:** Introduction to PC-based tools for engineering. **PREREQUISITE:** MATH 1710 with a grade of C- or better. **COREQUISITE:** MATH 1720 or MATH 1730 or MATH 1910.

# MECH 1314 - Mech Engr Computing II

**Credit Hours:** (2) **Description:** Introduction to computer programming including application to linear algebra, probability, and statistics. **PREREQUISITE:** MATH 1720 or MATH 1730 with a grade of C- or better. **PREREQUISITE or COREQUISITE:** MATH 1910

### **MECH 1395 - Honors Studies**

**Credit Hours:** (1) **Description:** Participation in scholarly activities such as research and design programs within the college under the supervision of a faculty mentor. Successful completion requires the mentor's acceptance of a report documenting the student's accomplishments. NOTE: This course is intended for students in their first year of academic study and may be repeated for a maximum of 3 hours credit. **PREREQUISITE:** admission to the Honors Program.

# **MECH 2311 - Engineering Thermodynamics I**

**Credit Hours:** (3) **Former:** (MECH 3311) **Description:** Laws of thermodynamics and their applications to engineering problems. **PREREQUISITE:** CHEM 1110, PHYS 2110, and MATH 2110 with a grade of C- or better.

#### 1270 MECH 2318 - Engr Design Communication

**Credit Hours:** (3) **Description:** Fundamentals of 3D modeling, drawing, general dimensioning and tolerances, blueprint reading, and generating drawings; design of mechanical components and simple functional mechanical systems using 3D computer aided design models. **PREREQUISITE:** MATH 1720 or MATH 1730 with a grade of C- or better.

#### **MECH 2320 - Mechanics of Materials**

**Credit Hours:** (3) **Description:** Analysis of components subjected to tension, compression, bending moment, torque; combined loading; Mohr's stress circle; deflection of beams; simple treatment of column buckling. **PREREQUISITE:** CIVL 2131 or BIOM 2810 with a grade of C- or better.

### MECH 2332 - Dynamics

**Credit Hours:** (3) **Description:** Kinematics and kinetics of particles and rigid bodies. **PREREQUISITE:** MATH 2110 or MATH 2422 with a grade of C- or better; CIVL 2131 or BIOM 2810 with a grade of C- or better.

### MECH 2395 - Honors Studies

**Credit Hours:** (1) **Description:** Participation in scholarly activities such as research and design programs within the college under the supervision of a faculty mentor. Successful completion requires the mentor's acceptance of a report documenting the student's accomplishments. NOTE: This course is intended for students in their second year of academic study and may be repeated for a maximum of 3 hours credit. **PREREQUISITE:** Admission to the Honors Program.

### **MECH 3301 - Engineering Analysis**

**Credit Hours:** (3) **Description:** Mechanical Engineering applications of first and second order ordinary differential equations, Laplace transforms, and Fourier series to problems in the areas of heat transfer, vibrations, and fluid mechanics. **PREREQUISITE:** MATH 2110 or MATH 2422 with a grade of C- or better.

### **MECH 3310 - Intro to Thermal Systems**

**Credit Hours:** (3) **Description:** Introduction to First and Second Laws of Thermodynamics and to heat transfer with particular emphasis on engineering applications. Mechanical Engineering majors may not use MECH 3310 to fulfill B.S.M.E. degree requirements.

**PREREQUISITE:** MATH 1920 or MATH 2421 with a grade of C- or better.

### MECH 3312 - Engineering Thermodynamics II

**Credit Hours:** (3) **Description:** Applications of thermodynamics laws; emphasis of real gases, real gas mixtures, Maxwell Equations,

combustion, gas cycles and vapor cycles and psychometrics. **PREREQUISITE:** MECH 2311 with a grade of C- or better.

# **MECH 3320 - Engineering Materials**

**Credit Hours:** (3) **Description:** Nature of six main classes of materials: metals, polymers and elastomers, ceramics and glasses, semiconductors, superconductors and composites; mechanical, thermal, electrical and electronic, magnetic and optical properties of materials; environmental effects on performance of materials: creep, corrosion, oxidation; methodology for selection of materials for named applications. **PREREQUISITE:** CHEM 1110 with a grade of C- or better; MECH 2320 or BIOM 2810 with a grade of C- or better.

# **MECH 3321 - Mechanics of Machines**

**Credit Hours:** (3) **Description:** Velocity and acceleration analysis of linkages and mechanisms; force analysis of linkages and mechanisms and machinery such as IC engines; dynamic balance of rotors and reciprocating masses. **PREREQUISITE:** MECH 2332 with a grade of C- or better; MATH 2120 or MATH 3402 with a grade of C- or better.

# MECH 3323 - Machine Design

**Credit Hours:** (3) **Description:** Methodology and practice in designing machine components by integrating principles from mechanics of materials, and theories of static and fatigue failures. **PREREQUISITE:** MECH 2320 and either MECH 3316 or MECH 2318.

### MECH 3325 - Materials Laboratory

**Credit Hours:** (1) **Description:** Materials testing and evaluation. Fee Engineering Course Fee Three laboratory hours per week. **PREREQUISITE:** MECH 2320

### **MECH 3331 - Fluid Mechanics**

**Credit Hours:** (3) **Description:** Statics and dynamics of fluids; including application to pipe flow and open channel flow. **PREREQUISITE:** MATH 2120, MECH 2332, and MECH 2311 with a grade of C- or better.

### MECH 3335 - Fluid Mechanics Lab

**Credit Hours:** (1) **Description:** Principles of fluid mechanics are demonstrated and verified; familiarization with instrumentation and techniques in organizing and reporting results of experimental investigations; design of experiments. Three laboratory hours per week. **PREREQUISITE:** MECH 3331

### **MECH 3341 - Numerical/Statistical Methods**

**Credit Hours:** (3) **Description:** Engineering methods, classical analysis, computer techniques, probability, statistics and their interactions with mechanical engineering problems.

1271 **PREREQUISITE:** MECH 1314 with a grade of C- or better; MATH 2120 or MATH 3402 with a grade of C- or better.

# MECH 3351 - Heat Transfer I

**Credit Hours:** (3) **Description:** Fundamentals of conduction, convection, and radiation heat transfer with emphasis on engineering applications. **PREREQUISITE:** MECH 3331 with a grade of C- or better.

## **MECH 3395 - Honors Studies**

**Credit Hours:** (1) **Description:** Participation in scholarly activities such as research and design programs within the college under the supervision of a faculty mentor. Successful completion requires the mentor's acceptance of a report documenting the student's accomplishments. NOTE: This course is intended for students in their third year of academic study and may be repeated for a maximum of 3 hours credit. **PREREQUISITE:** admission to the Honors Program.

# **MECH 4300 - Prep/Professional Practice**

**Credit Hours:** (1) **Description:** A capstone course to prepare students for the transition from academic studies to professional practice. Topics include: engineering ethics, lifelong learning, societal impact of engineering decisions, contemporary issues, and preparation for the Fundamentals of Engineering (FE) examination. Students are encouraged to take the FE during the semester in which they are enrolled in this course. Passing a Simulated FE is required to pass this course. **PREREQUISITE:** MECH 2311, MECH 3320, MECH 3323, MECH 3351.

### MECH 4305 - Fluid Mechanics II

**Credit Hours:** (3) **Description:** Introduction to various topics in advanced fluid mechanics, including: flow over immersed bodies; compressible fluid flow; turbomachinery; measurements in fluid mechanics; and, inviscid flow. **PREREQUISITE:** MECH 3331 with a grade of C- or better.

### MECH 4309 - Gas Dynamics

**Credit Hours:** (3) **Description:** Concepts in compressible flow, including topics such as isentropic flow, varying area flow, normal and oblique shockwaves, Fanno flow, and Rayleigh flow. **PREREQUISITE:** MECH 3312, MECH 3331 with a grade of C- or better.

### **MECH 4312 - Power Generation**

**Credit Hours:** (3) **Description:** Application of thermodynamics, fluid mechanics and heat transfer to design and operation of power plants; economic operation of power generation, optimization of resources, and alternate energy systems. **PREREQUISITE:** MECH 3312 with a grade of C- or better.

### MECH 4313 - Heat Transfer II

**Credit Hours:** (3) **Description:** Principles of boiling, condensation, and radiation heat transfer; fundamentals of heat exchanger design. **PREREQUISITE:** MECH 3351 with a grade of C- or better.

# MECH 4314 - Senior Design I

**Credit Hours:** (3) **Description:** Capstone course that simulates the real world design process. Students work in project teams to determine solutions to an open-ended engineering problem; use technical writing and communication skills to produce a project plan; prepare a preliminary design report and review. **PREREQUISITE:** MECH 2311, MECH 3320, MECH 3323, and MECH 3351 with grades of C-or better.

# **MECH 4315 - Principles of HVAC Systems**

**Credit Hours:** (3) **Description:** Psychometric analysis, heating and cooling loads of buildings and analysis of air conditioning systems. **PREREQUISITE:** MECH 3351 with a grade of C- or better.

# MECH 4319 - Engineering Econ/Project Mgmt

**Credit Hours:** (2) **Description:** Introduction to project planning, project management, and engineering economics including financial impact of decisions. **PREREQUISITE:** MECH 2311, MECH 3320, MECH 3323, MECH 3351.

### MECH 4320 - Mechanics of Materials II

**Credit Hours:** (3) **Description:** Stress-strain analyses of thin-walled cylinders and spheres, springs, laterally loaded struts, struts with initial curvature, rotating disks and cylinders; plastic yielding of beams and shafts; introduction to energy methods. **PREREQUISITE:** MECH 2320, MECH 3320 with grades of C- or better.

# MECH 4322 - System Dynamics

**Credit Hours:** (3) **Description:** Introduction to vibrations of onedegree and two-degrees-of-freedom systems. Introduction to controls with emphasis on Laplace transform, block diagrams, first-and-secondorder systems, basic controllers, and stability of systems. Design and modeling of mechanical control systems. **PREREQUISITE:** MECH 3321 with a grade of C- or better.

### MECH 4323 - Senior Design II

**Credit Hours:** (3) **Description:** Continuation of Senior Design I. Students refine their design, fabricate a functional prototype, produce a final report, and give an oral presentation. **PREREQUISITE:** MECH 4314 with a grade of C- or better.

### MECH 4324 - Computer Methods in Design

**Credit Hours:** (3) **Description:** Application of computer aided drafting packages to design of mechanical components and systems. Introduction to fundamental concepts and principles of finite element methods and design optimization. Design project assignments using computerized engineering software for analysis and design solution. **PREREQUISITE:** MECH 3323, MECH 3341 with a grade of C- or better.

#### MECH 4325 - Adv Mech Materials

**Credit Hours:** (3) **Description:** Beams on elastic foundations, experimental stress analysis, torsion of non-circular sections, curved beam theory, unsymmetrical bending. **PREREQUISITE:** MECH 2320 with a grade of C- or better.

#### MECH 4326 - Biomedical System Analys/Mech

**Credit Hours:** (3) **Description:** Introduction to concepts used in analyzing living systems. Simulation of body functions with mechanical and computer models. Familiarization with design of mechanical bioengineering devices such as heart valves, heart-lung machines, renal dialysis machines. **PREREQUISITE:** MECH 2332, MECH 2320 with a grade of C- or better.

### **MECH 4330 - Intro Composite Materials**

**Credit Hours:** (3) **Description:** Introduction to fiber reinforced composite materials. Includes mechanical behavior, strength, design methodology, and implementation of computer aided design. **PREREQUISITE:** MECH 3320, MECH 2320, MECH 3341 with a grade of C- or better.

#### **MECH 4331 - Turbomachinery**

**Credit Hours:** (3) **Description:** Basic principles of fluid mechanics and thermodynamics as applied to rotating machinery; ideal and actual operating characteristics of pumps, fans, turbines and compressors; design of real systems. **PREREQUISITE:** MECH 3331 with a grade of C- or better.

### **MECH 4333 - Aerospace Propulsion Syst**

**Credit Hours:** (3) **Description:** Fundamentals of air breathing and rocket propulsion devices; principles of combustion thermodynamics, gas turbine operation, solid and liquid propellants, performance evaluation, and atmospheric and space mission propulsion requirements. **PREREQUISITE:** MECH 3331 with a grade of C- or better.

### MECH 4335 - System Dynamics Lab

**Credit Hours:** (1) **Description:** Experiments in vibrations and feedback control systems with experimental verification of theory in system dynamics studies. Three laboratory hours per week. **PREREQUISITE:** MECH 4322.

# **MECH 4337 - Internal Combustion Engines**

**Credit Hours:** (3) **Description:** Principles of Otto and Diesel cycle engines; effects of various fuels and fuel delivery systems, air induction systems, ignition systems, and pollution control techniques on engine performance. **PREREQUISITE:** MECH 3312, MECH 3331 with a grade of C- or better.

# MECH 4339 - Appld Computational Fluid Dyna

**Credit Hours:** (3) **Description:** Introduction to fundamental mathematical models and computational methods for simulating the physics of fluid flow and heat transfer; identify limitation of simulation approach, recognize sources of error, evaluation of solution quality. **PREREQUISITE:** MECH 3341, MECH 3351 with a grade of C- or better.

# **MECH 4340 - Manufacturing Processes**

**Credit Hours:** (3) **Description:** Introduction to manufacturing processes: fundamentals of mechanical behavior of materials, manufacturing properties of materials; casting, bulk deformation, sheet metal forming, material removal processes; processing of polymers, ceramics and glasses, composite materials; powder metallurgy; fastening and joining processes; nontraditional manufacturing processes; economics of integrated design and manufacturing; recent developments in manufacturing. **PREREQUISITE:** MECH 3320, MECH 2320 with a grade of C- or better.

# MECH 4341 - Intro to Additive Manufacturing

**Credit Hours:** (3) **Former:** (MECH 4401) **Description:** Additive Manufacturing (AM) is a process of joining materials to make objects from 3D model data, usually layer upon layer, as opposed to subtractive manufacturing methodologies. This course offers a thorough introduction to the basics, principles, and applications of commercially available additive manufacturing techniques. **PREREQUISITE:** MECH 2320 or CIVL 3121

# MECH 4342 - Intro/Packaging Engineering

**Credit Hours:** (3) **Description:** Fundamental study of functions of packaging, packaging material, container type, processes, technology and equipment employed to protect goods during handling, shipping and storage.

# **MECH 4344 - Mechanical Controls**

**Credit Hours:** (3) **Description:** Fundamental classical control concepts; modeling of linear mechanical control systems; transient, accuracy and performance analyses and design of control systems using root locus sketch, Nyquist diagrams and Bode plots. **PREREQUISITE:** MECH 3321 with a grade of C- or better.

# MECH 4345 - Design of Mechanisms

**Credit Hours:** (3) **Description:** Graphical and analytical mechanism synthesis techniques for path generation, function generation, rigid body guidance and optimization of force transmission characteristics. **PREREQUISITE:** MECH 3321, MECH 3323 with a grade of C- or better.

## MECH 4346 - Adv Mechanical Controls

**Credit Hours:** (3) **Description:** Advanced design and modeling of mechanical control systems; review of digital and optimal control systems and simulation of control systems. **PREREQUISITE:** MECH 4344 with a grade of C- or better.

# **MECH 4350 - Principles of Biomechanics**

**Credit Hours:** (4) **Description:** Biomechanics of tissues and structures of musculosketetal system; biomechanics of all joints; applications of statics, mechanics, linear viscoelasticity. **PREREQUISITE:** MECH 3320, MECH 2320 with a grade of C- or better.

# MECH 4355 - Thermo/Heat Transfer Lab

**Credit Hours:** (1) **Former:** (MECH 3355) **Description:** Instrumental and measurement techniques used in thermodynamics and heat transfer studies; experimental verification of basic principles with emphasis on organizing and reporting of results; design of experiments. Three laboratory hours per week. **PREREQUISITE:** MECH 3351

# **MECH 4360 - Selection of Engr Materials**

**Credit Hours:** (3) **Description:** Detailed study of main classes of materials and their properties and uses; design criteria for various failure modes and selected environment case studies, technical tutorials and design exercises. **PREREQUISITE:** MECH 3320, MECH 2320 with a grade of C- or better.

# **MECH 4365 - Biomaterials**

Credit Hours: (4) Description: Biocompatibility and biofunctionality; materials for bone and joint replacement; materials for the cardiovascular system; materials and artificial organs; dental restorative materials; materials for drug delivery; materials for ophthalmology. PREREQUISITE: MECH 3320, MECH 2320 with a grade of C- or better. *Cross listing:* (Same as BIOM 4730).

# **MECH 4369 - Process Engineering**

**Credit Hours:** (3) **Description:** Application of fundamental principles of fluid mechanics, heat transfer, and thermodynamics to the analysis and design, fabrication and construction of process equipment and facilities which include physical and/or chemical transformations. **PREREQUISITE:** MECH 3351 with a grade of C- or better.

# **MECH 4371 - Mechanical Vibrations**

**Credit Hours:** (3) **Description:** Kinematics of harmonic and nonharmonic vibrations; system of one and several degrees of freedom, free and forced vibrations; self-excited vibrations. **PREREQUISITE:** MECH 3321 with a grade of C- or better.

# **MECH 4383 - Nondestructive Test I**

**Credit Hours:** (3) **Description:** Visual and optical methods; radiographic methods; ultrasonic testing; acoustic emission; magnetic methods; eddy current method; penetrant testing; standards, training and certification issues; case studies; projects. **PREREQUISITE:** MECH 3320, MECH 3323, MECH 3341 with grades of C- or better.

# MECH 4384 - Nondestructive Test II

**Credit Hours:** (3) **Description:** Nuclear radiographic methods; acoustic and dynamic techniques; magnetic resonance testing; volatile liquid testing; thin layer chromatography; thermoplastic stress analysis; research techniques; case studies; projects. **PREREQUISITE:** MECH 4383 with a grade of C- or better.

# MECH 4391 - Mechanical Engineering Proj

**Credit Hours:** (1-3) **Description:** Independent investigation of mechanical engineering problems in consultation with instructor. **PREREQUISITE:** senior standing.

# MECH 4393 - Appld Finite Element Analysis

**Credit Hours:** (3) **Description:** Fundamental topics associated with use of finite element analysis in mechanical and biomedical engineering applications; introduction to finite element theory, model generation, CAD interfacing, post-processing of results and validation. **PREREQUISITE:** BIOM 2810 or MECH 2320 with a grade of C- or better. *Cross listing:* (Same as BIOM 4393).

# **MECH 4395 - Honors Thesis Proposal**

**Credit Hours:** (3) **Description:** Scholarly work in engineering requires advanced understanding in a particular field of study as well as the foundation in fundamental principles provided by the undergraduate curriculum. The student will work with an Honors Thesis advisor to identify a suitable thesis topic and to develop the advanced understanding required for scholarly study of that topic. A formal written and oral proposal must be accepted by the departmental honors committee for the successful completion of this course. **PREREQUISITE:** senior standing and approval by the departmental honors committee.

# **MECH 4396 - Honors Thesis**

**Credit Hours:** (3) **Description:** Original scholarly work is performed under the direction of an Honors Thesis advisor and reported in a thesis. Successful completion of this course requires an oral defense of the thesis and acceptance of the thesis by the departmental honors committee. **PREREQUISITE:** MECH 4395 with a grade of C- or better and approval by the departmental honors committee. **Credit Hours:** (1) **Description:** Preparation for professional practice through experiential learning under the supervision of an experienced engineer with oversight by a member of the department's faculty. Students must work a minimum of 10 hours, and no more than 20 hours per week. Regular reporting throughout course required. Repeatable Maximum repeat for 3 hours credit, but student may not enroll in MECH 4397 for more than 1 credit hour per semester. Cannot be taken concurrently with ENGR 4001. **PREREQUISITE:** departmental approval. *Cross listing:* BIOM 4410

1274

# MECH 4990-4998 - Special Topics in Mechanical Engineering

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

# MRCH 2000 - Visual Imaging for Fashion and Merchandising

**Credit Hours:** (3) **Description:** Students learn the fundamental specific to fashion and merchandising using relevant software such as Adobe Photoshop and Illustrator. They develop original designs through research. Trends, design journals, various presentation formats and design markets are explored.

# MRCH 2004 - Tech Skills for Merchandising

**Credit Hours:** (3) **Former:** (CSED) **Description:** Students interested in housing, home furnishing, and related areas focus on varied program of technical skills involving 2-point perspective sketches and drafting freehand and with computer. Spring only. **PREREQUISITE:** MRCH 2000

# MRCH 2005 - Introd to the Fashion Industry

**Credit Hours:** (3) **Former:** (CSED) **Description:** Introduction to the types of enterprises, activities, operations, interrelationships, and practices in fashion industry; emphasis on merchandising terminology and techniques.

### **MRCH 2010 - Textiles**

**Credit Hours:** (3) **Former:** (Formerly MRCH 4405) **Description:** Application of research, critical thinking, and problem solving skills to identify and analyze textile industry trends, historical events and developments, and practices that support the merchandising of textiles and end products to consumers.

# **MRCH 2050 - Computer Applications for VMED**

**Credit Hours:** (3) **Description:** Use of computer applications as a creative design and merchandising communication tool. This course introduces concepts and principles of CAD techniques in enabling

designers to develop and present their concepts in 2D and 3D drawings and renderings. **PREREQUISITE:** MRCH 2000, MRCH 2004.

# MRCH 2106 - 3D Visual Merchandising

**Credit Hours:** (3) **Former:** (CSED) **Description:** Theory and practice in visual merchandising (display); including retail interior planning, window display techniques, display creation, planning promotions, and determining budgets. **PREREQUISITE:** MRCH 2000, MRCH 2004. **PREREQUISITE or COREQUISITE:** MRCH 2000

# MRCH 2200 - Fashion Sketching and Illustration for Design

**Credit Hours:** (3) **Description:** This course students learn the proportions and techniques for sketching the nine-head figure.and emphasizes the perfection of fashion figure poses, the accurate illustration of garments, and the development of the students own sketching style. Students learn to render, using colored pencil, markers, pen and computer. **PREREQUISITE:** MRCH 2000

# MRCH 2300 - Contemporary Design Mavens and Influencers

**Credit Hours:** (3) **Description:** Students will explore who and what influences contemporary fashion and decor. This course introduces participants to the revered creatives regarded as experts, leaders and the influencers in their respective fields. These elite blaze trails and incite the development of trends. In this class, we will explore the current cultural conditions that support these mavens and research the trend forecasts for upcoming seasons.

# MRCH 3000 - Color and Basic Design Studies and Applications

**Credit Hours:** (3) **Description:** Introduction to the elements and principles upon which designs are structured. Concepts covered include line, shape, value, composition, space, texture, and color theory and their application into the industry of fashion and visual merchandising. Course projects focus on the digital manipulation of photo imagery and the development of fabric prints and graphics with emphasis on the elements and principles of design. Students critique aspects of a visual representation by analyzing the components of design and the use of color by the designer. **COREQUISITE:** MRCH 2000

# MRCH 3010 - Trends in Home and Exhibition

**Credit Hours:** (3) **Description:** Provides an overview of interior trends covering the history of interior spaces and the main categories of home furnishings together with merchandising and exhibition practices of the 20th and 21st centuries.

# MRCH 3050 - Costume History

Credit Hours: (3)

**Description:** This course provides an overview of costume history in Western culture from ancient civilizations to the present. Students examine cultural, social, and historical events and analyze their effect on the history of costume and apparel, including the influence of historical costume on fashion today. Students develop a broad fashion vocabulary and become familiar with period costume terminology.

# MRCH 3075 - Basic Industry Sewing and Construction

**Credit Hours:** (3) **Description:** This course introduces the student to the basic concepts of garment construction. The student will have an overview of the industrial equipment, the processes of measuring, cutting, sewing, and sequence of assembly. Through the completion of samples and the construction of basic garments, students apply fundamental garment construction skills utilizing industrial equipment. **PREREQUISITE:** MRCH 2005, MRCH 3000.

# MRCH 3100 - Pattern Drafting I

**Credit Hours:** (3) **Description:** Flat pattern techniques in accordance with garment trade practices. Emphasis will be on the manipulation of patterns for more complex designs. Students develop an understanding of how to use the basic block in constructing muslin samples. **PREREQUISITE:** MRCH 2000, MRCH 3075

# MRCH 3206 - Merchandising Systems and Applications

**Credit Hours:** (3) **Description:** Analysis of formulas used to plan and control the flow of merchandise through the use of both computer and manual systems. PREREQUISITE: Satisfactory completion of the General Education mathematics requirements. **PREREQUISITE:** MRCH 2005. Satisfactory completion of the General Education mathematics requirements. ACCT 2010 is recommended. Recommended ACCT 2010 is recommended.

# **MRCH 3215 - Textiles Applications**

**Credit Hours:** (3) **Description:** Introduction to the regulations and laws that apply to the apparel industry. They will research and source textile manufacturers and mills relevant to product development. Application of research, critical thinking, and problem solving skills to identify and analyze textile industry trends, historical events and developments, and practices that support the merchandising of textiles and end products to consumers. **PREREQUISITE:** MRCH 2010

# MRCH 3220 - Materials Exploration

**Credit Hours:** (3) **Description:** This course introduces students to non-textile materials, from exploring how they are produced, sourced, installed and maintained. Students will explore the composition of materials used in ceiling and flooring products, kitchen and bathroom surfaces, paint pigments, furniture, and home appliances. **PREREQUISITE:** MRCH 2010, MRCH 3215

### **MRCH 3300 - Draping Techniques**

**Credit Hours:** (3) **Description:** This course introduces students to basic draping techniques and industry procedures. It is an introduction to understanding proportion, fit, and balance in a 3-dimensional design. **PREREQUISITE:** MRCH 2005, MRCH 2010, MRCH 3075, and MRCH 3100.

# MRCH 3400 - Computer Aided Fashion Drawing and Design

**Credit Hours:** (3) **Description:** Development of technical sketches and illstrations utilizing Adobe Illustrator and Photoshop. Hands-on experience in drawing of flat technical sketch and creating accurate garment detail. **PREREQUISITE:** MRCH 2000, MRCH 3000, and MRCH 2200.

# MRCH 3450 - Computer Patternmaking

**Credit Hours:** (3) **Description:** In this introduction to the fundamentals of pattern drafting techniques using Gerber Technology, students reinforce skills developed in previous manual pattern drafting classes and apply their knowledge to producing patterns using the computer. Additional pattern drafting techniques are explored. Students also produce markers. **PREREQUISITE:** MRCH 3075, MRCH 3100, and MRCH 3400.

# MRCH 3600 - Consumer Engagement in the Digital Era

**Credit Hours:** (3) **Description:** In this course, students evaluate the impact of the Internet on consumer behaviors and learn to integrate evolving mobile commerce, social media, merchandise presentation technologies, and customer data analytics into effective merchandising strategies for the omni-channel era. Students will apply concepts by understanding their own digital presence and professional brand, in addition to assessing the digital presence of relevant individuals and organizations. **PREREQUISITE:** MRCH 2000 and MRCH 3000.

# MRCH 3650 - Merchandise Buying

**Credit Hours:** (3) **Description:** A course in the study of stock control and managing open-to-buys which provides a practicum in buying and utilizing computer spreadsheets for data analysis. **PREREQUISITE:** MRCH 2005 and MRCH 3206.

# MRCH 3700 - Strategic Design for Residential Space

**Credit Hours:** (3) **Description:** This course introduces students to elements and principles of residential design, space planning, and home furnishing. Students will learn how to produce floor plans and elevations and explore emerging strategic design practices in the residential environment. **PREREQUISITE:** MRCH 2000, MRCH 2004, and MRCH 3010.

#### 1276 MRCH 4000 - Advanced Sewing Techniques

**Credit Hours:** (3) **Description:** In this course students study advanced construction techniques applied to more structured garments building on shills from basic industry sewing and construction techniques. **PREREQUISITE:** MRCH 2005, MRCH 2010, MRCH 3075, MRCH 3100, and MRCH 3300. **PREREQUISITE or COREQUISITE:** MRCH 3075

# MRCH 4200 - Strategic Design for Exhibition Space

**Credit Hours:** (3) **Description:** Students develop concepts and designs for exhibition design. This course focuses on the historical, social, artistic, and technical trends and developments. Highlights include designing and curating spaces, trade shows, pop-ups, commercial and museum displays and experiences. The interdisciplinary integration of existing spaces, graphic design/signage, and digital media will be explored in this course. **PREREQUISITE:** MRCH 2000, MRCH 2004, MRCH 2050, MRCH 3700, MRCH 3010, and MRCH 3000.

# **MRCH 4204 - Furnishing Prblms/Presentations**

**Credit Hours:** (3) **Former:** (CSED) **Description: Description:** Critical thinking and problem solving related to planning, coordinating, and purchasing of home furnishings. Two lecture hours, one lab hour per week. Fall only. **PREREQUISITE:** MRCH 3104. Two lecture hours, one lab hour per week. Fall only.

# MRCH 4205 - Behavioral Sci Aspects Clothng

**Credit Hours:** (3) **Former:** (CSED) **Description:** Interdisciplinary study of clothing and appearance; concepts, methodologies, and applications of behavioral science to clothing. **PREREQUISITE:** Junior standing. Fall only.

### MRCH 4300 - Family Resource Management\*\*

**Credit Hours:** (3) **Former:** (CSED) **Description:** Investigates values, goals, and human and material resources necessary for individuals and families to make informed management decisions throughout the life span. Spring only.

### MRCH 4400 - Pattern Drafting II

#### Credit Hours: (3)

**Description:** Advancement of apparel design skills through twodimensional fashion pattern manipulation and creation. Students focus on conceptual design through patternmaking and documentation of the design process.. Emphasis will be on the manipulation of patterns for more complex designs. Students study advanced patternmaking and construction techniques including stretch fabric blocks for garment creation emphasizing comprehensive use of acquired pattern making skills as well as advanced techniques.

# MRCH 4500 - Advanced Computer Patternmaking

**Credit Hours:** (3) **Description: Description:** This course will focus on the advanced use of Computer Aided Design in patternmaking. Students will utilize industry software and hardware to engineer patterns from original designs in a laboratory setting. Work will be initiated for presentation in the final portfolio of student work. **PREREQUISITE:** MRCH 3075, MRCH 3100, MRCH 3400, MRCH 3450, and MRCH 4500.

# MRCH 4501 - Fashion Sketching and Illustration for Design II/Collections

**Credit Hours:** (3) **Description:** In this course, students will use all levels of research and inspiration appropriate to designing fashion collections. Illustrations will utilize advanced techniques in rendering and emphasize the fashion figure, garments, details, and textiles using various media with a focus on application of color and texture. Students will develop technical flats using traditional and digital methods and will present their resolved concepts in a format that best conveys their personal design identity. **PREREQUISITE:** MRCH 3400

# MRCH 4550 - Design and Fit Analysis

#### Credit Hours: (3)

**Description:** This course provides the foundation for defining fit by applying techniques for accurately fitting garments on a body. Students will demonstrate understanding by translating changes back to a flat pattern.

# MRCH 4560 - Trend Analysis and Styling Concepts

**Credit Hours:** (3) **Description:** The course focuses on the study of trends, trend forecasting, demographics and social issues that affect the fashion industry. It introduces students to the field of fashion styling and its relationship to the fashion industry. Through completion of location and studio projects students develop basic requirements to produce contemporary fashion imagery. Students gain experience in how to source clothing and accessories necessary for styling and creative direction. **PREREQUISITE:** MRCH 2000, MRCH 2005, MRCH 2010, MRCH 3000, and MRCH 3050.

# MRCH 4575 - Sourcing and Technical Design

**Credit Hours:** (3) **Description:** Students execute creative and complex fashion flats utilizing digital tools such as Photoshop, Illustrator and Excel. Working from actual samples, they learn industry standards to digitally illustrate flat measurements and develop detailed callouts with related information. **PREREQUISITE:** MRCH 2000 and MRCH 2005 and MRCH 3400 or MRCH 2004.

### MRCH 4600 - Senior Seminar

**Credit Hours:** (3) **Former:** (CSED) **Description:** Concentrated study of factors influencing the transitional process from career academics to career implementation. (F, Sp only) **PREREQUISITE:** Students enrolling in this course must have completed all courses required for the degree including the merchandising concentration, minor, general education, and elective requirements. **COREQUISITE:** UNIV 4110, UNIV 4995.

# MRCH 4900 - Study Tour/FCS

**Credit Hours:** (1-3) **Description:** On-the-scene knowledge about specific academic areas of specialization within Consumer Science and Education. PREREQUISITE: permission of instructor. Maximum of 6 credit hours for degree program.

# MRCH 4920-4929 - Special Topics in Merchandising

**Credit Hours:** (1-3) **Description:** Lectures and conferences covering selected areas of current interest. See online class listings for topics. Repeatable May be repeated; credit applicable to degree is limited.

# **ARMY 1000 - Physical Readiness Training**

**Credit Hours:** (1) **Description:** Students develop and apply leadership skills leading small groups utilizing US Army Readiness Training doctrine. Activities are outdoors and include team building, team competition, and resiliency training. Repeatable readiness requirement for Army ROTC enrolled students NOTE: Open only to Army ROTC Cadets. (F, S) **PREREQUISITE:** Permission of Professor of Military Science. **COREQUISITE:** ARMY 1200/1201, ARMY 1300/1301, ARMY 2200/2201, ARMY 2300/2301, ARMY 3200/3201 ARMY 3300/3301, ARMY 4200/4201, ARMY 4300/4301

# ARMY 1200 - Introduction to the US Army

**Credit Hours:** (2) **Description:** Introduction to the US Army culture, values, ethic, and operations. Students examine the Army Profession and what it means to be a professional in the US Army, focusing on the development of the basic skills necessary for operating as an Army Officer. (F) **COREQUISITE:** ARMY 1201, ARMY 1000

### ARMY 1201 - Introduction to the US Army Lab

**Credit Hours:** (1) Two per laboratory hours per week. (F) **COREQUISITE:** ARMY 1200, ARMY 1000

### **ARMY 1300 - Agile and Adaptive Leadership**

**Credit Hours:** (2) **Description:** Introduction to development of basic knowledge and comprehension of Army leadership, dimension, attributes and competencies, while gaining an understanding of the ROTC program, its purpose, and its advantages for the student. (S) **COREQUISITE:** ARMY 1000, ARMY 1301

# ARMY 1301 - Agile and Adaptive Leadership Lab

**Credit Hours:** (1) Two Laboratory hours per week (S) **COREQUISITE:** ARMY 1000, ARMY 1300

### **ARMY 2200 - Leadership and Decision Making**

**Credit Hours:** (2) **Description:** Introduction to foundational leadership doctrine and skills by following and leading small units to achieve assigned missions. Course focus is applying critical thinking and problem solving using the Troop Leading Procedures. (F) **COREQUISITE:** ARMY 1000, ARMY 2201

# ARMY 2201 - Leadership and Decision Making Lab

**Credit Hours:** (1) Two laboratory hours per week. (F) **COREQUISITE:** ARMY 1000, ARMY 2200

### **ARMY 2300 - Doctrine and Team Development**

**Credit Hours:** (2) **Description:** Introduction to Army doctrine and team development with a focus on Army Values, Teamwork, and the Warrior Ethos and their relationship to the Law of Land Warfare. (S) **COREQUISITE:** ARMY 1000, ARMY 2301

# ARMY 2301 - Doctrine and Team Development Lab

**Credit Hours:** (1) Two laboratory hours per week. (S) **COREQUISITE:** ARMY 1000, ARMY 2300

# ARMY 3200 - Warfighting Functions/Training

**Credit Hours:** (2) **Description:** Advanced study on training management and the warfighting functions. The course focuses on the application of military training and the warfighting functions in a complex operational environment. Students will become capable of planning, preparing, executing, and assessing squad and platoon tactics. (F) **PREREQUISITE:** Permission of Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 3201

### **ARMY 3201 - Warfighting Functions/Training Lab**

**Credit Hours:** (1) Two laboratory hours per week. (F) **PREREQUISITE:** Permission of Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 3200

### **ARMY 3205 - History of Military Tactics**

**Credit Hours:** (2) **Description:** US Army specific history course that focuses on the background and growth of the US Army, military thought, difficulties of modernization, and global responsibilities. Repeatable for increased grade. NOTE: (Open only to enrolled Army ROTC Cadets) (F, S) **PREREQUISITE:** Permission of Professor of Military Science

**Credit Hours:** (2) **Description:** Advanced study on enhancing individual and collective skills including leader competencies, understanding training management acumen, and effective leadership of formations at the squad and platoon level. (S) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 3301

### ARMY 3301 - Small Unit Leadership Lab

**Credit Hours:** (1) Two laboratory hours per week. (S) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 3300

#### **ARMY 4150 - Independent Study**

**Credit Hours:** (2) **Description:** Independent Study in Military Science, reserved for 5th year Senior Cadets with a focus on student teaching/mentorship of junior ROTC Cadets and advanced supervision/assessment of student led training. (F, S) **PREREQUISITE:** Permission of the Professor of Military Science

### ARMY 4200 - The Army Officer

**Credit Hours:** (2) **Description:** Advanced development of Army Officer knowledge, skills, and abilities to plan, resource, and assess training at the small unit level. At the conclusion students will be capable of planning, preparing, executing, and assessing military training at the Company and Field Grade Officer level. (F) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 4201

### ARMY 4201 - The Army Officer Lab

**Credit Hours:** (1) Two laboratory hours per week. (F) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 4200

### ARMY 4300 - Company Grade Leadership

**Credit Hours:** (2) **Description:** Advanced development and introduction to operational ambiguous environments, platoon leader operations, company operations, and advanced critical thinking and problem solving. (S) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 4301

### ARMY 4301 - Company Grade Leadership Lab

**Credit Hours:** (1) Two laboratory hours per week. (S) **PREREQUISITE:** Permission of the Professor of Military Science **COREQUISITE:** ARMY 1000, ARMY 4300

### MUS 1003 - World of Music

**Credit Hours:** (3) **Description:** Introduction to music of cultures around the world. Focuses on traditional and popular music and on music in cultural context.

## MUS 1040 - Music in America

**Credit Hours:** (3) **Description:** American music history, sources and current styles; elements of music, genre, and media. Attendance at some concerts required. NOTE: May not be used to satisfy requirements for degree in Music. **[G]** 

# **MUSE 1101 - Class Inst Brass**

**Credit Hours:** (1) **Description:** Basic performance skills and teaching techniques on trumpet, trombone, French horn, baritone horn and tuba for those who intend to teach instrumental music in schools. (SP)

### **MUSE 1103 - Class Inst Percussion**

**Credit Hours:** (1) **Description:** Basic performance skills and teaching techniques on snare drum, timpani, and keyboard percussion instruments for those who intend to teach instrumental music in schools. (F)

# **MUSE 1104 - Class Inst Woodwinds**

**Credit Hours:** (1) **Description:** Basic performance skills and teaching techniques on clarinet, flute, saxophone, oboe, and bassoon for those who intend to teach instrumental music in schools. (SP)

### **MUSE 1116 - Class Instr Strings**

**Credit Hours:** (1) **Description:** Basic performance skills and teaching techniques on violin, viola, cello, or double bass for those who intend to teach instrumental music in schools. (F)

### MUSE 1119 - Guitar/Music Teacher

**Credit Hours:** (1) **Description:** Basic guitar technique, chording and folk style accompaniments; prepares students for effective teaching in general music classes.

# MUSE 2002 - Foundations Music Ed

**Credit Hours:** (2-3) **Description:** Development of philosophical foundation for music education professionals; values, attitudes and work habits of the effective teacher will be stressed; field experiences and techniques of observation.

# **MUSE 3101 - Functional Keyboard Skills**

**Credit Hours:** (2) **Description:** Functional keyboard harmony designed for keyboard majors; open-score vocal and instrumental sight reading. (SP-odd years) **PREREQUISITE:** MUTC 1009, MUTC 1011.

### **MUSE 3700 - Basic Conducting**

**Credit Hours:** (2) **Description:** Development of conducting skills; basic baton principles, rhythmic analysis, expressive techniques, phrasing, and multimetered problems; class meetings require performing as instrumentalist or vocalist as well as conductor. Three class hours per week. (F) **PREREQUISITE:** MUTC 1009/MUTC 1011.

### MUSE 4201 - Individual Study Music Educatn

**Credit Hours:** (1-3) **Description:** Individual study of problems and opportunities faced by person who teaches music in schools; for classroom teachers, music teachers, supervisors, principals, and administrators. Repeatable May be repeated for a maximum of 6 hours credit, but not for the purpose of changing original grade.

# MUSE 4205 - Marching Band Technique

**Credit Hours:** (1) **Description:** Organizing and conducting marching band; gridiron charting; marching procedures; study of precision drill, formation, pageantry. **PREREQUISITE:** permission of instructor.

### **MUSE 4208 - Band Literature**

**Credit Hours:** (3) **Description:** History and evolution of wind instruments and wind instrument playing and the history and development of the wind band and its literature, with general background material on the specific composers involved. (SP)

### MUSE 4209 - Piano Technology for Pianists

**Credit Hours:** (2) **Former:** (Piano Tuning/Repair) **Description:** A historical overview of the instrument and a practical overview of piano technology for the performer and teacher.

### **MUSE 4211 - Vocal Diction I**

**Credit Hours:** (2) **Description:** Phonetic study of English and Italian languages in detail; introduction and basic rules of Latin pronunciation; International Phonetic Alphabet transcription of songs and arias. Open to collaborative pianists only or by permission of instructor . (Alternate years)

### **MUSE 4212 - Vocal Diction II**

**Credit Hours:** (2) **Description:** Phonetic study of Italian, French, and Spanish in detail, including IPA transcription of songs and arias and class performance. Other languages (Russian, Hebrew, etc.) may be covered as time permits. (Alternate years)

### MUSE 4213 - Mat/Method/Elementary Music

**Credit Hours:** (3) **Former:** (4203) **Description:** Philosophy, methods and materials for teaching music classes in secondary schools, grade K-

6; demonstration and simulation of classroom teaching at this level. TEP Restricted. (F) **PREREQUISITE:** MUSE 2002.

# MUSE 4215 - Jazz Ensemble Technique

**Credit Hours:** (1) **Description:** Jazz phrasing, articulation; ensemble settings; repertoire selection; administration of school jazz program. **PREREQUISITE:** permission of instructor.

# MUSE 4251 - Guitar Pedagogy

**Credit Hours:** (3) **Description:** Principles of and materials for teaching classical guitar.

# MUSE 4260-4269 - Special Topics in Music Education

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

### MUSE 4403 - Material/Meth Inst Musc 9-12

**Credit Hours:** (3) **Description:** Designed to prepare the instrumental music teacher to teach music concepts to intermediate and advanced players in mixed instrumental group settings. Instruction methodologies and materials, objectives, evaluation, motivation, and administration stressed. (F) **PREREQUISITE:** MUSE 2002 and junior standing in music.

### MUSE 4405 - Matrl/Method Choral Mus 7-12

**Credit Hours:** (3) **Description:** Selected materials and methods of practical concern to the vocal-choral music specialist; consideration of music series, scheduling techniques, voice class development, choral publishers, units of study. (F) **PREREQUISITE:** MUSE 2002 and junior standing in music. **COREQUISITE:** MUSE 4406.

### MUSE 4501 - Piano Pedagogy I

**Credit Hours:** (2) **Description:** Training teachers for beginning through intermediate level piano instruction. Establishing strong artistic, musical and technical foundations. (F-even years) **PREREQUISITE:** permission of instructor.

### MUSE 4503 - Piano Pedagogy II

**Credit Hours:** (2) **Description:** Training teachers for advanced piano instruction; extensive readings from renowned artist-teachers and performers; development of ideation and memorization skills; observations and supervised practice teaching. (SP-odd years) **PREREQUISITE:** MUSE 4501 or permission of instructor.

### MUSE 4505 - Collab Piano Technique

**Credit Hours:** (2) **Description:** Performance class involving practical study of instrumental and vocal standard repertory and the problems of ensemble playing; facility in sight-reading and ability to assimilate music rapidly; score reading, transposition, and figured bass realization introduced as skills necessary to well rounded musicianship. (F-even years) **PREREQUISITE:** permission of instructor.

#### MUSE 4506 - Suzuki String Pedagogy I

**Credit Hours:** (3) **Description:** Required of students who plan to serve as apprentice string teachers in U of M Suzuki Talent Education program. Basic instruction in Suzuki philosophy; participation with parents and children in Suzuki string classes.

# MUSE 4508 - Prin of Suzuki Piano

**Credit Hours:** (3) **Description:** Suzuki philosophy applied to development of the child's abilities and role of teacher and parent. Students will analyze technical and musical instruction of beginning piano student. (F) **PREREQUISITE:** upper division piano skills.

# MUSE 4509 - Suzuki String Pedagogy II

**Credit Hours:** (3) **Description:** Literature and technique taught in Suzuki Violin School; fundamental technique, development of posture, tone and listening ability in beginning students; analysis of pedagogical material. Required of students who plan to serve as apprentice teachers in U of M Suzuki String Program. **PREREQUISITE:** MUSE 4506.

# MUSE 4510 - Suzuki String Pedagogy III

**Credit Hours:** (3) **Description:** Literature and technique taught in Suzuki Violin School; emphasis on development of advanced student; laboratory experience in U of M Suzuki String Program. Required of students planning to be apprentice teachers in U of M Suzuki String Program. **PREREQUISITE:** MUSE 4509.

### MUSE 4511 - Class Piano Pedagogy

**Credit Hours:** (3) **Description:** Group instruction techniques in teaching of beginning, intermediate, and early advanced piano. Emphasizes observation and practical application. For the piano major and/or prospective piano teacher. (SP - even years) **PREREQUISITE:** upper division level in keyboard or permission of instructor.

# MUSE 4513 - Suzuki String Pedagogy IV

**Credit Hours:** (3) **Description:** Analysis of pedagogical materials and techniques introduced in volumes five and six of Suzuki Violin School. **PREREQUISITE:** MUSE 4509.

### MUSE 4514 - Brass Pedagogy

**Credit Hours:** (3) **Description:** Examination of current literature, principles, methods and psychology in brass playing and teaching. Students will participate in videotaped teaching assignments which will

be used to improve one-to-one teaching skills in the studio setting. (SP - even years)

# **MUSE 4520 - Percussion Pedagogy**

**Credit Hours:** (3) **Description:** Basic principles of and materials for teaching percussion instruments. (SP - even years)

## **MUSE 4521 - Woodwind Pedagogy**

**Credit Hours:** (3) **Description:** Principles of and materials for teaching flute, oboe, clarinet, bassoon, and saxophone.

### MUSE 4523 - Vocal Pedagogy

**Credit Hours:** (2) **Description:** Basic principles of and materials for teaching young singers.

### **MUSE 4601 - Integrative Arts**

**Credit Hours:** (3) **Former:** (MUHL 4601) **Description:** Cultural activities in their interrelation with each other and with corresponding historic and economic events. Open without prerequisite to non-music majors of junior and senior standing.

### **MUSE 4700 - Instrumental Conducting**

**Credit Hours:** (2-3) **Description:** Various problems encountered in preparation and conducting of instrumental scores; individual practice with opportunity for each student to conduct instrumental groups. Three class hours per week. **PREREQUISITE:** MUSE 2002, MUSE 3700, MUTC 2008/MUTC 2010.

# **MUSE 4701 - Choral Conducting**

**Credit Hours:** (2-3) **Description:** Various problems encountered in preparing and conducting traditional and contemporary vocal scores; rehearsal techniques; individual practice with laboratory groups. Three class hours per week. **PREREQUISITE:** MUSE 2002, MUSE 3700 MUTC 2008/MUTC 2010.

### MUSE 4802 - Level I Orff-Schulwerk

**Credit Hours:** (3) **Description:** Basic Orff-Schulwerk techniques including pentatonic scale, simple borduns, ostinato, and playing pitched and unpitched percussion instruments and soprano recorder. Topics and skills in this highly participatory course will also include vocal and rhythm training, movement, and improvisation. A degree in music or strong musicianship required. **PREREQUISITE:** Junior standing in music education or permission of course director.

### MUSE 4901 - Residency I

**Credit Hours:** (5) **Description:** Residency I focuses on implementing various methodologies, assessing students, classroom management, and classroom discipline in the PreK-12 school and inclusionary settings.

This course interfaces specifically with the content area of music. Requires admission to TEP.

### MUSE 4911 - Residency II

**Credit Hours:** (9) **Description:** Full-time planned and supervised teaching experience in music providing opportunities to synthesize knowledge and skills and demonstrate professional competencies in educational settings. **PREREQUISITE:** MUSE 2002 and approval of music education faculty. **COREQUISITE:** MUSE 4999.

#### **MUSE 4999 - Professional Seminar**

**Credit Hours:** (3) **Description:** Seminar to be taken concurrently with student teaching requiring student to analyze practices, solve problems and review timely material pertinent to the field of music education; emphasis on addressing concerns and questions arising in student teaching settings. **PREREQUISITE:** MUSE 2002. **COREQUISITE:** MUSE 4911.

### MUHL 3301 - History of Music to 1750

**Credit Hours:** (3) **Description:** Development of significant musical styles; attention to individual contribution of major composers. (F) **PREREQUISITE:** MUTC 1009/MUTC 1011.

### MUHL 3302 - History of Music Since 1750

Credit Hours: (3) Description: Continuation of MUHL 3301. (SP) **PREREQUISITE:** MUTC 1009/MUTC 1011.

#### MUHL 3303 - Western Music History

**Credit Hours:** (3) **Description:** Study of major style periods in Western Music History for the non-performance student of music.

### MUHL 4001 - Piano Repertory

**Credit Hours:** (2) **Description:** Survey of stringed keyboard repertory from Bach and his contemporaries to the present. Representative works analyzed regarding historical, stylistic, formal and aesthetic features. (F) **PREREQUISITE:** junior standing in music or permission of instructor.

### MUHL 4002 - Song Repertory I

**Credit Hours:** (2) **Description:** Survey of solo literature from the German and Italian schools of song. (F-even years)

### MUHL 4003 - Song Repertory II

**Credit Hours:** (2) **Description:** Survey of solo literature from the French, British, and American schools of song. (SP-odd years)

# MUHL 4005 - History/Literature of Organ

**Credit Hours:** (3) **Description:** Literature for the organ and its effect on and interaction with organ design.

# MUHL 4008 - The Symphony

**Credit Hours:** (3) **Description:** Survey of development of the symphony for 18th century to present with focus on important composers and works; discussion of orchestration and form, aesthetics, performance practice. **PREREQUISITE:** MUHL 3302.

# MUHL 4009 - Choral Literature I

**Credit Hours:** (3) **Description:** Survey of choral repertories from Gregorian chant to 1700; contemporary performance practices; techniques of performing early choral music with modern mixed choirs.

# MUHL 4010 - Choral Literature II

**Credit Hours:** (3) **Description:** Survey of choral repertories from 1700 to present; contemporary performance practices; problems of modern performance.

# MUHL 4011 - String Quartet Literature

**Credit Hours:** (3) **Description:** History of string of quartet; survey of its music from Haydn to present; problems of performance.

### MUHL 4012 - Hist Chamber Music/Wind Instr

**Credit Hours:** (3) **Description:** History of chamber music for brass and woodwind instruments from medieval through modernist periods; instruments, types of ensembles, musical sources, notation, repertory, and performance practice.

### MUHL 4013 - Women and Music

**Credit Hours:** (3) **Description:** Investigation of roles women have played throughout history of Western art music, music they have composed, performed, inspired.

### MUHL 4014 - Chamber Music/Piano

**Credit Hours:** (3) **Description:** Study of development of works for piano and one other instrument; piano trios, piano quartets; piano quintets; stylistic analyses of works from classic, romantic, and twentieth-century repertory. (F)

### MUHL 4015 - Guitar Literature

**Credit Hours:** (3) **Description:** Basic repertory of classical guitar and its predecessors from the middle ages to the present. (F - odd years)

### MUHL 4016 - Jazz Vocal Styles

1282 **Credit Hours:** (3) **Description:** Survey of jazz vocal styles from the 1920's through the present, incorporating listening, lecture, and analysis. Recorded works by important figures from each style and period will be studied.

### MUHL 4018 - Oratorio Literature

**Credit Hours:** (3) **Description:** A survey of oratorio repertoire with emphasis for the performer; looking at important composers and works, including discussion of form, text, and historical and current performance practice.

### MUHL 4020 - Solo Brass Literature

**Credit Hours:** (3) **Description:** Examination, evaluation and critique of solo repertoire for brass instruments. Reference books and material will be examined as well as the development of specific courses of study for each instrument. (SP - odd years)

### MUHL 4021 - American Amateur Brass Band

**Credit Hours:** (3) **Description:** History and circumstances of the American amateur band movement in the 19th and early 20th centuries; practical exploration of its musical repertory. **PREREQUISITE:** MUHL 3302, or permission of instructor.

# MUHL 4022 - Early Chamber Music

**Credit Hours:** (3) **Description:** Study of repertories for small groups of strings and winds from the middle ages to 1700.

### MUHL 4030 - Percussion Repertory

**Credit Hours:** (3) **Description:** Survey of available literature for percussion instruments. (SP - odd years)

# MUHL 4160-4169 - Special Topics in Music History, Literature, and Appreciation

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

### MUHL 4259 - Studies in Bibliography

**Credit Hours:** (3) **Description:** Research techniques in music history; finding, evaluating, and using sources; writing about music. Preparation of the Senior Project Prospectus. (F)

### MUHL 4304 - Music History Review

**Credit Hours:** (3) **Description:** Review of genres, repertories, major figures, and development of western music. May not be used to fulfill any course requirement in the B.M. degree.

# MUHL 4406 - Music since 1900

**Credit Hours:** (3) **Description:** Advanced study of music in its historical context from 1900 to the present.

### MUHL 4407 - History of Opera

**Credit Hours:** (3) **Description:** History of opera from its beginnings to the present. **PREREQUISITE:** MUHL 3301, MUHL 3302; or permission of instructor.

# MUHL 4500 - String Repertory

**Credit Hours:** (3) **Description:** Histories, texts, methods, periodicals, orchestral studies, and solo and ensemble literature of the individual string instruments.

# MUHL 4800 - World Musical Styles

**Credit Hours:** (3) **Description:** Introduction to the study of ethnomusicology; traditional and popular musical styles and the role of music in societies throughout the world. (F)

# MUHL 4801 - American Folk/Popular Music

**Credit Hours:** (3) **Description:** Folk and popular elements in American music; role of mass media in folk and popular music; historical development and interrelationships of various musical styles ranging from 19th century minstrelsy through rock and roll and hiphop; emphasis on southern Anglo-American and Afro-American folk and popular musical styles. (F)

# MUHL 4803 - Indiv Study in Music History

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of music history chosen in consultation with instructor. Repeatable May be repeated for credit with permission of director. May be repeated for a maximum of 6 hours credit.

### MUHL 4804 - Blues

**Credit Hours:** (3) **Description:** Stylistic development of blues music from its beginnings; its relationships to African-American and American culture and history. (SP)

### MUHL 4805 - History of Rock and Roll

**Credit Hours:** (3) **Description:** Stylistic origins and development of rock and roll music from its beginnings to the present.

### MUHL 4806 - History of Jazz

**Credit Hours:** (3) **Description:** Stylistic origins and development of jazz; interaction of jazz and Western classical music styles.

### MUHL 4807 - Memphis Music

1283 **Credit Hours:** (3) **Description:** Distinctive forms of folk and popular music in Memphis since the beginning of the 20th century; relationships to history, culture, and social patterns of the city and midsouth region; folk music background; blues, jazz, country music, gospel music, soul music, and rock and roll emphasized. (Sp)

## MUHL 4999 - Music History Senior Project

**Credit Hours:** (3) **Description:** Preparation for an article length paper on original topic in music history or ethnomusicology under supervision of advisor. **PREREQUISITE:** minimum of 9 hours in advanced music history course and permission of instructor.

# MUID 1001 - Intro Music Technology

**Credit Hours:** (1) **Description:** Basic introduction to music technologies available to the musician; introduction to software, hardware, and basic tenets of MIDI sequencing, notation, composition, studio audio production CR ROM availability, CD/DVD technology. **PREREQUISITE or COREQUISITE:** MUTC 1001 or MUTC 1008.

### MUID 2201 - Intro to Music Industry

**Credit Hours:** (2) **Description:** Exploration of all aspects of recording industry; career opportunities; on-stage and behind stage scenes; organization of music business; how music business generates and distributes revenue; day-to-day operations of record labels, studios, publishing, production, promotion, management companies.

# MUID 3103 - Contmp Songwrt/Prod Technique

**Credit Hours:** (3) **Description:** Process of developing an idea into a commercially viable song and applying production techniques for maximum commercial potential. **PREREQUISITE:** MUTC 2103, or permission of instructor.

# MUID 3105 - Music Marketing & Management

**Credit Hours:** (3) **Description:** Exploration of tactics, strategies, and challenges in developing and managing careers of recording and touring artists; examination of the role and importance of an artist manager, what they do, and how they impact an artist's career; details of planning an artist's career, budgeting, advertising and publicity, developing marketing materials, and creating a comprehensive marketing plan. **PREREQUISITE:** MUID 2201, MKTG 3010, MUID 3506.

### **MUID 3506 - Music Distribution**

**Credit Hours:** (3) **Description:** Analysis of current and future trends of music distribution; how to build a website, develop a fan-base, utilize direct-to-fan marketing and crowd funding tools, as well as social media and other online resources to engage fans. **PREREQUISITE:** MUID 2201.

# MUID 3704 - Recording Studio Tech/Practice

**Credit Hours:** (3) **Description:** Explores the basic techniques and concepts of the recording studio; signal flow, microphones and microphone placement, digital recording process, editing tracks, mixing and mastering, MIDI, loop creation and editing, studio problem solving, building studio projects. It also explores current trends in the entertainment industry, including internet, radio, television, and film, and additionally, how it affects our modern society. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

# MUID 3705 - Cont Sngwrting/Prod Techniques

**Credit Hours:** (3) **Description:** Develop creative and critical techniques in songwriting; analysis of popular styles and techniques are discussed; basic music techniques, theory, performance practices, production techniques, poetry, and music history are used. The influence of mass media and technology (printing, recording, radio, video, Internet) are examined; listening, lyrical analysis, musical analysis, and history are included. Eight categories are discussed: lyrics, melody, harmony, rhythm, production, form, dynamics and instrumentation. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

# MUID 3800 - Recording Studio Technology

**Credit Hours:** (3) **Description:** Detailed examination of basic theory, operational concepts and technologies upon which modern audio production is based; exploration of creative production techniques used to enhance music recordings. **PREREQUISITE:** sophomore standing, completion of MATH 1830, TECH 1811, and permission of instructor.

# MUID 3801 - Digital Data Structures

**Credit Hours:** (2) **Description:** Focus on needs of practicing audio engineer. Concepts and practices of using equipment commonly found in electronic music studios with emphasis on digital audio workstation; sampling, synthesis, MIDI, patching, editing, synchronization, signal processing and creative commercial production techniques. NOTE: Basic computer operations will not be covered. Students must be proficient with Macintosh or Windows environment including; basic system operations, data backup functions, file manipulation, data translation and common application programs. **PREREQUISITE:** computer literacy, MUID 3800 and permission of instructor.

# MUID 3802 - Audio Rcrd/Non Tech Maj

**Credit Hours:** (3) **Description:** Equipment, techniques, musical production values and technology commonly used in modern audio production. Designed to give music business major an understanding of production process and to enhance studio musician's ability to provide creative services during recording sessions. **PREREQUISITE:** sophomore standing and permission of instructor.

# MUID 3901 - Critical Listening I

1284 **Credit Hours:** (1) **Description:** Detailed examination of qualitative aspects of audio; development of critical listening skills including identification of frequency and time domain anomalies, distortions, amplitude changes, dynamics, and spatial positioning in simple audio sources; anatomy of human ear; psychoacoustics. **COREQUISITE:** MUID 3800 and permission of instructor.

# MUID 3902 - Critical Listening II

**Credit Hours:** (1) **Description:** Detailed examination of qualitative aspects of audio; refinement of critical listening skills including identification of frequency and time domain anomalies, distortions, amplitude changes, dynamics, and spatial positioning in audio sources **PREREQUISITE:** MUID 3901 and permission of instructor.

# MUID 3903 - Critical Listening III

**Credit Hours:** (1) **Description:** Detailed examination of qualitative aspects of audio; refinement of critical listening skills including identification of frequency and time domain anomalies, distortions, amplitude changes, dynamics, and spatial positioning in complex audio sources; evaluation of reverberation and digital effects. **PREREQUISITE:** MUID 3902 and permission of instructor.

# **MUID 3905 - Digital Audio Workstations**

**Credit Hours:** (3) **Description:** In depth examination of Digital Audio Workstation production techniques; emphasis on structure, capabilities, tools and command-sets of DAW. **PREREQUISITE:** MUID 3800 and permission of instructor.

### **MUID 4201 - Studies in Commercial Music**

**Credit Hours:** (1-3) **Description:** Class or supervised individual study of special problems in Commercial Music. Repeatable May be repeated when course content varies.

# MUID 4250 - Rec Studio Tech/Prac

**Credit Hours:** (3) **Description:** Explores the basic techniques and concepts of the recording studio. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

# MUID 4260-4265 - Special Topics in Commercial Music

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

### MUID 4301 - Legal Aspcts Live Ent Industry

**Credit Hours:** (3) **Description:** This course will examine various business and legal aspects of the live entertainment industry, with a primary focus on performance agreements and licenses for the live

performance of music in commercial or public areas. *Cross listing:* MUID 6301

# MUID 4302 - Record Label Operations III

**Credit Hours:** (3) **Description:** Direct participation in administering and operating the University's High Water Record Label and Music River Publishing Company; searching for, signing, and developing new artists; promoting the song catalog to music supervisors; preparation of marketing plans and budgets; supervision of graphic design and manufacturing process; retail relations; video production; distribution.

# MUID 4303 - Record Label Operations IV

**Credit Hours:** (3) **Description:** The second of two experiential classes focusing on record company operations as they relate to key industry elements including record label departments, A&R, CD distribution/manufacturing, new media, artist relations, contracts, and booking shows; real-world application utilizing the University's High Water record label and Music River Publishing company. Students will apply the artist life cycle process from distribution/promotion through touring.

# MUID 4604 - Legal Aspects Music Industry

**Credit Hours:** (3) **Description:** Legal aspects of music including copyright, intellectual property rights as they relate to the music industry; examination of publishing company operations and the role of exploiting musical compositions, performing rights organizations, recording contracts, publishing contracts, artist/manager contracts, artist/talent agent contracts.

### MUID 4701 - Music Licensing/Publishing

**Credit Hours:** (3) **Description:** Detailed examination of intellectual property rights as they relate to the commercial music industry. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

### MUID 4800 - Basic Recording

**Credit Hours:** (4) **Description:** Audio engineering on modern multichannel recording equipment using commercial production techniques; emphasis on skills of console operation, microphone selection and placement, session setup, preparing musical instruments for recording, editing, mixing and engineer's artistic involvement in project. (SP) **PREREQUISITE:** TECH 1811, MUID 3800, and permission of instructor.

### **MUID 4801 - Problems in Commercial Music**

**Credit Hours:** (1-3) **Description:** Supervised independent study. Repeatable May be repeated for a maximum of 9 hours credit, but not for purpose of changing original grade. **PREREQUISITE:** permission of instructor. **Credit Hours:** (3) **Description:** Advanced instruction in producing contemporary commercial recordings; application of production practice to recording assignments; advanced study of session technique, signal processing, mixing, editing, automation, synchronization, equipment and digital recording. **PREREQUISITE:** MUID 3801, MUID 4800 and permission of instructor. **COREQUISITE:** MUID 4822.

#### MUID 4803 - Adv Mix/Master Audio

**Credit Hours:** (3) **Description:** Techniques for creating professional mixes in stereo and multichannel formats utilizing digital audio workstations and analog signal processing; mastering techniques for creating duplication-ready masters; surround microphone techniques and multichannel recording. **PREREQUISITE or COREQUISITE:** COMM 4825. Completion of JRSM 3900 and CRMM 4900 preferred.

### **MUID 4806 - Concert Sound Reinforcement**

**Credit Hours:** (3) **Description:** Basic equipment and production techniques for providing live sound services; methods for handling various sized groups in diverse locations. **PREREQUISITE:** MUID 4800 and permission of instructor.

### **MUID 4810 - Audio Production Practicum**

**Credit Hours:** (1-3) **Description:** Supervised audio production activities. Repeatable May be repeated for a maximum of 9 hours credit, but not for the purposes of changing original grade. **PREREQUISITE:** MUID 4800 and permission of instructor.

#### **MUID 4811 - Studio Maintenance Practicum**

**Credit Hours:** (1-3) **Description:** Troubleshooting and maintenance activities under the supervision of studio staff. A minimum of 42 clock hours of service for each credit hour is required. Repeatable May be repeated for a maximum of 9 hours credit, but not for the purpose of changing original grade. **PREREQUISITE:** MUID 4800 and permission of instructor.

### MUID 4812 - Concert Sound Practicum

**Credit Hours:** (1-3) **Description:** Diverse live sound reinforcement activities. A minimum of 42 clock hours of service for each credit hour is required. Repeatable May be repeated for a maximum of 9 hours credit, but not for the purpose of changing original grade. **PREREQUISITE:** MUID 4800, MUID 4806 and permission of instructor.

### **MUID 4820 - International Music Business**

**Credit Hours:** (3) **Description:** Expands upon fundamental of domestic music business practice covered in previous classes through examination of business practices and infrastructure which drives

global music marketplace; emphasis on cultural, media business, legal aspects affecting music industry and its global audience. **PREREQUISITE:** MUID 2201, senior standing and permission of instructor.

# MUID 4822 - Applied Lessons in Recording

**Credit Hours:** (1) **Description:** Individual instruction in Advanced Recording. Fee Course Fee: \$160. **COREQUISITE:** MUID 4802.

# MUID 4825 - Concerts and Touring

**Credit Hours:** (3) **Description:** Concert promotion, advertising, talent buying, routing, budgeting, ticketing, sponsorships, merchandise, settlement, and tour development; examines roles of various players in the touring industry with an emphasis on developing alternative revenue streams for touring artists. (Sp)

# MUID 4830 - Trends Business Pract/Tech

**Credit Hours:** (3) **Description:** Supervised directed study in cutting edge business practices and technologies impacting the recording industry; emphasis on commercial viability and business impact. Formal presentation of research required. **PREREQUISITE:** MUID 2201, junior standing and permission of instructor.

# MUID 4833 - Applied Lessons in Mixing

**Credit Hours:** (1) **Description:** Individual instruction in mixing, mastering, and multi-channel audio production. Fee Course Fee: \$160. **COREQUISITE:** MUID 4803.

# MUID 4840 - Entrepreneurship Comm Music

**Credit Hours:** (3) **Description:** Creation of preliminary business plan for formation of music industry related business; explores motivation for starting a music business, the music marketplace, naming the business, financing, and operation. **PREREQUISITE:** MKTG 3010, MGMT 3510, 3410, JRSM 3900, senior standing, and permission of instructor.

# MUID 4850 - Record Company Operations I

**Credit Hours:** (3) **Description:** Direct participation in administering and operating the University's Blue Tom and High Water record labels; searching for, signing, and developing new artists; preparation of marketing plans and budgets; supervision of graphic design and manufacturing process; retail relations; video production; distribution. **PREREQUISITE:** MUID 2201, junior standing, and permission of instructor.

# MUID 4851 - Record Company Operations II

**Credit Hours:** (4) **Description:** The second of two experiential classes focusing on record company operations as they relate to key industry elements including record label departments, A&R, CD

distribution/manufacturing, new media, artist relations, contracts, and booking shows; real-world application utilizing the University's Blue Tom and High Water record labels. Students will apply the artist life cycle process from distribution/promotion through touring.

1286

## MUID 4898 - Sr Proj Music Bus/Rec Technlgy

**Credit Hours:** (4) **Description:** Comprehensive final project which demonstrates mastery of creative, technical, and business elements of commercial music industry. Intended to be taken during the student's last semester before graduation. **PREREQUISITE:** senior standing and permission of instructor.

# MUID 4899 - Internship

**Credit Hours:** (1-3) **Description:** One semester of supervised field work experience in selected areas of the commercial music industry. A minimum of 42 clock hours of service for each credit hour is required. Repeatable May be repeated for a maximum of 9 hours credit, but not for the purpose of changing original grade. **PREREQUISITE:** placement interview and permission of instructor.

# MUTC 1001 - Basic Music Theory

**Credit Hours:** (3) **Description:** For students who plan to major in music but do not meet minimum standards for MUTC 1008. Not allowable as credit toward the satisfaction of requirements for the major or minor. Two laboratory hours per week.

### MUTC 1002 - Musicianship I

**Credit Hours:** (5) **Description:** Integrated musicianship course combining music theory, ear training, and group piano in a shared curriculum; explores pitch, rhythm, intervals, scales, and chords in various musical styles.

# MUTC 1008 - Music Theory I

**Credit Hours:** (3) **Description:** Fundamentals of pitch and rhythmic notation; scales, intervals, diatonic, triads, and seventh chords in major and minor keys; principles of voice leading and harmonic progressions; Roman numeral and lead sheet notation. **PREREQUISITE:** Theory placement exam and permission of department.

# MUTC 1009 - Music Theory II

**Credit Hours:** (3) **Description:** Cadences, phrases and periods; nonchord tones, four-voice part writing with diatonic seventh chords; secondary functions. **PREREQUISITE:** completion of MUTC 1008 with a grade of C- or better.

# MUTC 1010 - Ear Training I

**Credit Hours:** (1) **Description:** Introduction to melodic dictation, sight-singing, musicianship and listening skills. **PREREQUISITE:** theory placement exam and permission of department.

# MUTC 1011 - Ear Training II

**Credit Hours:** (1) **Description:** Melodic and harmonic dictation, diatonic sight-singing, musicianship and listening skills. **PREREQUISITE:** completion of MUTC 1010 with a grade of C- or better.

# MUTC 2002 - Musicianship II

**Credit Hours:** (5) **Description:** Integrated musicianship course combining music theory, ear training and group piano in a shared curriculum at an intermediate level; develops analytical, improvisational, reading, and aural skills. **PREREQUISITE:** MUTC 1002

# **MUTC 2008 - Chromatic Harmony**

**Credit Hours:** (3) **Description:** Modulations; classical forms, mode mixture, augmented sixth chords, extended tertian chords and late 19th century tonality. **PREREQUISITE:** completion of MUTC 1009 with a grade of C- or better.

# MUTC 2010 - Ear Training III

**Credit Hours:** (1) **Description:** Introduction to melodic and harmonic chromatic dictation; chromatic sight-singing; musicianship and listening skills. **PREREQUISITE:** completion of MUTC 1011 with a grade of C- or better.

# MUTC 2103 - Theory Jazz/Pop/Commercial I

**Credit Hours:** (3) **Description:** Basic harmonic structures, chord symbol realization, altered scales and modes, altered and extended chords, notation, articulation, rhythmic patterns; aural practice and analysis of written and recorded jazz and pop music; transcription of recorded materials. Three lecture hours, one laboratory hour per week. (F) **PREREQUISITE:** MUTC 1009, MUAP 1116.

### **MUTC 2501 - Composition**

**Credit Hours:** (1-3) **Description:** Class instruction in free composition; emphasis on smaller forms. Fee Fee for this instruction is \$320 per semester. Repeatable May be repeated for additional credit. NOTE: Composition taught as applied music. Students receive the equivalent of one hour lesson per week. **PREREQUISITE:** MUTC 1008.

### **MUTC 2502 - Composition**

**Credit Hours:** (1-3) **Description:** Works for piano, voice, chorus, and small ensembles; study of style and analysis of works from music literature. Fee Fee for this instruction is \$320.00 per semester. Repeatable May be repeated for additional credit. NOTE: Composition is taught as applied music. Students receive equivalent of one hour lesson per week. **PREREQUISITE:** MUTC 2501 or permission of instructor.

#### 1287 MUTC 2503 - Comp/Arrange Jazz/Commercial I

**Credit Hours:** (2) **Description:** Emphasis on small instrumental and vocal works, basic style and form. Fee FEE: \$320. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** MUTC 2501, or permission of instructor.

#### MUTC 2504 - Comp/Arrange Jazz/Commrcial II

**Credit Hours:** (2) **Description:** Emphasis on stage and jazz band arranging techniques. Fee FEE: \$320. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** MUTC 2503, or permission of instructor.

### MUTC 2511 - Electronic Music I

**Credit Hours:** (2) **Description:** Concepts of electronic music including synthesizer operation, MIDI sequencing, and sampling. Fee FEE: \$320. **PREREQUISITE:** MUTC 2008 or permission of instructor.

#### MUTC 3008 - Post-Tonal Music

**Credit Hours:** (3) **Description:** Introduction and use of 20th century materials and techniques; post-tonal theory; indeterminacy, minimalism, electronic and computer music. **PREREQUISITE:** completion of <u>MUTC 1009</u> with a grade of C- or better.

### MUTC 3009 - Ear Training IV

**Credit Hours:** (1) **Description:** Advanced melodic and harmonic chromatic dictation; advanced chromatic sight-singing; musicianship and listening skills. **PREREQUISITE:** completion of MUTC 2010 with a grade of C- or better.

### MUTC 3010 - Aural Theory V

**Credit Hours:** (1) **Description:** Aural exploration of basic forms, cadences and styles of music; detailed aural analysis of modulatory elements within a piece. (F) **PREREQUISITE:** MUTC 3008, MUTC 3009. (S/U)

### **MUTC 3101 - Orchestration**

**Credit Hours:** (3) **Description:** Basic study of instruments of orchestra and band, terminology and techniques pertaining to that study; practical application by scoring for small and large instrumental combinations **PREREQUISITE:** MUTC 2008 or permission of instructor.

#### MUTC 3102 - Analysis of Tonal Music

**Credit Hours:** (3) **Description:** In-depth analysis of tonal music, building on techniques mastered in Theory I-III; includes a thorough study of common-practice era forms. Repertoire will vary.

PREREQUISITE: MUTC 2008 or permission of instructor

# MUTC 3109 - Advanced Analysis of Post-Tonal Music

**Credit Hours:** (3) **Description:** In-depth analysis of music since 1900, building on techniques mastered in Post-Tonal Music. Repetoire will vary. **PREREQUISITE:** MUTC 3008, MUTC 3009.

# MUTC 3201 - Jazz/Comm Arr/Orchestration

**Credit Hours:** (3) **Former:** Jazz Arrange/Orchestration **Description:** Arranging/orchestration for small to large ensembles in jazz and commercial music styles; idiomatic problems with vocalists, rhythm, electronic, wind, and string instruments in various jazz styles and commercial styles. **PREREQUISITE:** MUTC 2103.

# **MUTC 3301 - Commercial Music Arranging**

**Credit Hours:** (3) **Description:** Arranging for small to medium ensembles in commercial music styles. **PREREQUISITE:** MUTC 2103.

# MUTC 3501 - Comp/Arrang/Jazz/Comrcial III

**Credit Hours:** (2) **Description:** Individual instruction for mixed ensembles and studio groups in various jazz and studio styles, standard and extended forms; introduction to line writing. Fee Fee for this instruction is \$320.00 per semester. Repeatable May be repeated for additional credit. NOTE: Composition is taught as applied music. Students receive the equivalent of one hour lesson per week. **PREREQUISITE:** MUTC 2504, or permission of instructor.

# MUTC 3701 - Theory/Musicianship I

**Credit Hours:** (3) **Description:** An introduction to music theory and modern musical techniques; ability to anaylze and understand the concepts of music which includes writing, reading, and ear training in a popular musical world. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

# MUTC 3702 - Theory/Musicianship II

**Credit Hours:** (3) **Description:** An advanced analysis of music in the popular music world which includes writing, reading, and ear training. NOTE: this course does not fulfill the requirements for the Music Industry major (B.M.) or the Music Business or Recording Technology concentrations.

# MUTC 3825 - Material/Techniques Improv I

**Credit Hours:** (3) **Description:** Development of improvisation skills on solo instruments or voice; basic chord patterns, scales, arpeggios; performance with rhythm section. (F) **PREREQUISITE:** permission of instructor.

### MUTC 3826 - Material/Techniques Improv II

1288 **Credit Hours:** (3) **Description:** Analysis of melodic structures; motivic fragmentation and sequencing; extended harmonic structures, performance in small combo settings. (F). **PREREQUISITE:** MUTC 3825, or permission of instructor.

### MUTC 3827 - Material/Techniques Improv III

**Credit Hours:** (3) **Description:** Analysis and performance of music in standard styles, including bebop, Latin, fusion, and jazz/rock; contemporary mainstream, pan-chromatic, and free-form improvisation; performance with combos and large jazz ensembles. (F). **PREREQUISITE:** MUTC 3826, or permission of instructor.

# MUTC 4106 - Composition Procsses 20th Cent

**Credit Hours:** (3) **Description:** Analysis and imitative writing of major composers of the twentieth century, from Debussy through the present. (SP-even years)

### **MUTC 4202 - Music Theory Review**

**Credit Hours:** (3) **Description:** Advanced course in theory, counterpoint, and analysis of literature. Contrapuntal and harmonic techniques. Research; theoretical problems from pedagogical point of view; writing in strict and free styles. (F) **PREREQUISITE:** permission of instructor. Recommended Recommended as review course for graduate students.

## MUTC 4204 - Indiv Study Music Theory/Comp

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of music theory and composition chosen in consultation with instructor. Repeatable May be repeated for credit but not for the purpose of changing a grade.

### MUTC 4205 - 16th Cent Counterpoint

**Credit Hours:** (2) **Description:** Study of contrapuntal techniques of the sixteenth century.

### MUTC 4206 - 18th Cent Counterpoint

**Credit Hours:** (2) **Description:** Study of contrapuntal techniques of the eighteenth century.

### **MUTC 4209 - Advanced Orchestration**

**Credit Hours:** (3) **Description:** Continuation of MUTC 3101. Orchestration of works from nineteenth and twentieth centuries for full orchestra; study of representative orchestral scores from romantic and contemporary periods. **PREREQUISITE:** MUTC 3101.

### MUTC 4210 - Music Theory: Popular Styles

 
 Credit Hours: (3) Description: Detailed examination of music in popular styles of the 20th and 21st centuries. Study of harmonic http://catalog.memphis.edu/index.php
 structure, metric and rhythmic patterns, instrumentation, scales and other melodic materials, form, and various other considerations. **PREREQUISITE:** MUTC 1009 and MUTC 1010.

# MUTC 4260-4269 - Special Topics in Theory and Composition

**Credit Hours:** (1-3) **Description:** Topics are varied and announced in online class listing.

# **MUTC 4501 - Composition**

**Credit Hours:** (3) **Description:** Composition in varied forms for large and small ensembles and solo instruments; analysis of contemporary works and practical application of techniques. Fee Fee for this instruction is \$320.00 per semester. Repeatable May be repeated for additional credit. NOTE: Composition taught as applied music. Students receive equivalent of one hour lesson per week. **PREREQUISITE:** recommendation of upper division examining committee.

# MUTC 4502 - Comp For Non-Comp Major

**Credit Hours:** (3) **Description:** Class instruction in free composition for students not majoring in composition. Practical experience in idea generation, form, development, and instrumentation. Fee Fee for this instruction is \$320 per semester. NOTE: Composition taught as applied music. Students receive equivalent of one hour lesson per week. **PREREQUISITE:** MUTC 3008.

# MUTC 4503 - Comp/Arrange Jazz/Commrcial IV

**Credit Hours:** (3) **Description:** Individual instruction with emphasis on advanced line writing, fusion and contemporary mainstream styles, writing for full studio orchestra. Fee Fee for this instruction is \$320.00 per semester. Repeatable May be repeated for additional credit. NOTE: Composition is taught as applied music. Students receive the equivalent of one hour lesson per week. **PREREQUISITE:** MUTC 3501, or permission of instructor.

### MUTC 4504 - Intro Film/Video Score

**Credit Hours:** (3) **Description:** Basic problems of writing music for film and video: commercial and industrial productions, shorts and full length features, selection of appropriate styles, creating a master music list, writing from a cue sheet; introduction to editing room equipment: conversion of film frames to video, use of SMPTE time code and synchronization equipment, MIDI sequencer scoring from a digital audio workstation; project assignments in film and video formats. (Offered alternate years) **PREREQUISITE:** MUTC 2511, MUTC 3501, and either MUID 3801 or MUTC 4511 or 4505, or permission of instructor.

### MUTC 4511 - Electronic Music II

1289 Credit Hours: (2) Description: Concepts of electronic music including synthesizer operation, MIDI sequencing, and sampling. Course includes basic instruction in MaxMSP. May be repeated for credit once, but only 2 hours may be used as composition credit in the composition concentration. Fee FEE: \$320. PREREQUISITE: MUTC 2008 or MUTC 4210 or permission of instructor.

#### **MUTC 4512 - Electronic Music III**

**Credit Hours:** (2) **Description:** Continuation of MUTC 4511. Emphasis on individual compositional projects. Fee FEE: \$320. Repeatable May be repeated for credit, but only two hours may be used as composition credit in composition concentration. **PREREQUISITE:** MUTC 4511.

# **MUTC 4599 - Senior Composition Recital**

**Credit Hours:** (4) **Description:** Integration course for which students prepare and present a concert of their music and an accompanying descriptive paper. Taught as applied music, individual instruction. Fee \$320.00 **PREREQUISITE:** a minimum of 4 hours in MUTC 4501 and permission of the instructor.

# MUTC 4896 - Sr Prj Jazz Studio/Comp Arrang

**Credit Hours:** (4) **Description:** Project must include original compositions and original arrangements of existing compositions in a variety of styles. Project should include live performance, recorded album tracks, and film music. **PREREQUISITE:** MUTC 4503, MUTC 4504, or permission of instructor.

### NAVY 1500 - Introduction to Naval Science

**Credit Hours:** (3) **Former:** (1101) **Description:** General introduction to the USN and USMC. Emphasizes organizational structure, warfare components, and assigned roles/missions of USN/USMC. Covers all aspects of naval service from its relative position within DoD to the specific warfare communities/career paths. Also includes basic elements of leadership and Navy Core Values. Designed to give student initial exposure to many elements of naval culture. Also provides conceptual framework/working vocabulary for student to use on summer cruise. **COREQUISITE:** NAVY 1510.

### NAVY 1510 - Naval Leadership Laboratory

**Credit Hours:** (1) **Former:** (1100) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 1600 - Sea Power/Maritime Affairs

**Credit Hours:** (3) **Former:** (1105) **Description:** A study of the U.S. Navy and the influence of sea power upon history. Incorporates both a historical and political science process to explore the major events, attitudes, personalities, and circumstances that have imbued the U.S. Navy with its proud history and rich tradition. Deals with issues of national imperatives in peacetime, as well as war; varying maritime philosophies that were interpreted into naval strategies/ doctrines; budgetary concerns which shaped force realities; and the pursuit of American diplomatic objectives. Concludes with a discussion of the Navy's strategic and structural changes at the end of the Cold War and its new focus, mission, and strategy in the post-9/11 world. **COREQUISITE:** NAVY 1610.

# NAVY 1610 - Naval Leadership Laboratory

**Credit Hours:** (1) **Former:** (1104) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 2500 - Naval Leadership & Management

**Credit Hours:** (3) **Former:** (2401) **Description:** Introduces the student to many of the fundamental concepts of leading Sailors and Marines, which will be expanded upon during the continuum of leadership development throughout NROTC. Develops the elements of leadership vital to the effectiveness of Navy/Marine Corps officers by reviewing the theories and parameters of leadership and management within and outside of the naval service and progressing through values development, interpersonal skills, management skills, and application theory. Practical applications are explored through the use of experiential exercises, readings, case studies, and laboratory discussions. **COREQUISITE:** NAVY 2510.

# NAVY 2510 - Naval Leadership Laboratory

**Credit Hours:** (1) **Former:** (2206) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 2600 - Naval Ship Systems I/Engr

**Credit Hours:** (3) **Former:** (2205) **Description:** Detailed study of ship design, hydrodynamic forces, stability, propulsion, electrical theory and distribution, hydraulic theory and ship control, and damage control. Included are basic concepts of theory/design of steam, gas turbine, diesel, and nuclear propulsion. Case studies on leadership/ethical issues in the engineering arena are also covered. **COREQUISITE:** NAVY 2610.

**Credit Hours:** (1) **Former:** (2204) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 3000 - Naval Science Institute

**Credit Hours:** (8) **Description:** Intensive six-week professional academic and training program conducted each summer at a Naval installation by the Chief of Naval Education and Training for students entering the twoyear NROTC Programs. The Naval Science Institute is the equivalent of the NROTC Basic Course.

# NAVY 3500 - Navigation

**Credit Hours:** (3) **Former:** (3301) **Description:** In-depth study of the theory, principles, procedures, and application of plotting, piloting, and electronic navigation, as well as an introduction to maneuvering boards. Students learn piloting techniques, the use of charts, the use of visual and electronic aids, and the theory of operation of both magnetic and gyrocompasses. Students develop practical skills in plotting and electronic navigation. Other topics include tides, currents, effects of wind/weather, voyage planning, and an application and introduction to the international/inland rules of navigation. The course is supplemented with a review/analysis of case studies involving moral/ethical/leadership issues pertaining to the concepts listed above.

**COREQUISITE:** NAVY 3510.

# NAVY 3510 - Naval Leadership Laboratory

**Credit Hours:** (1) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 3520 - Evolution of Warfare

**Credit Hours:** (3) **Former:** (3310) **Description:** Traces the development of warfare to the present day. This course is designed to cover the causes of continuity and change in the means and methods of warfare. It addresses the influence of political, economic, and societal factors on the conduct of war, with significant attention focused on the role of technological innovation in changing the battlefield. Students will explore the contribution of preeminent military theorists and battlefield commanders to our modern understanding of the art and science of war. **COREQUISITE:** NAVY 3510.

# NAVY 3600 - Naval Operations & Seamanship

**Credit Hours:** (3) **Former:** (3302) **Description:** A continued study of relative motion, formation tactics, and ship employment. Also included are introductions to naval operations and operations analysis, ship behavior and characteristics in maneuvering, applied aspects of ship handling, afloat communications, naval command and control, naval warfare areas, and joint warfare. The course is supplemented with a review/analysis of case studies involving moral/ethical/leadership issues pertaining to the concepts listed above. **COREQUISITE:** NAVY 3610.

# NAVY 3610 - Naval Leadership Laboratory

**Credit Hours:** (1) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

# NAVY 3620 - Officer Candidate School Prep

**Credit Hours:** (3) **Description:** Designed to prepare students for success at USMC Officer Candidate School (OCS). Emphasis is placed on leadership skills, basic infantry tactics, and general subjects, including Marine Corps organization, history, customs and courtesies, and traditions. Practical application of skills such as land navigation and issuing combat orders is a central feature. **PREREQUISITE:** NAVY 3520 or NAVY 4520.

### NAVY 4500 - Naval Ship Systems II/Weapons

**Credit Hours:** (3) **Former:** (4207) **Description:** Outlines the theory and employment of weapons systems. Student explores the processes of detection, evaluation, threat analysis, weapon selection, delivery, guidance, and explosives. Fire control systems and major weapons types are discussed, including capabilities and limitations. The physical aspects of radar and underwater sound are described. Facets of command, control, communications, computers, and intelligence are explored as a means of weapons system integration. The tactical and strategic significance of command and control warfare and information warfare is discussed. This course is supplemented with review/ analysis of case studies involving the moral and ethical responsibilities of leaders in the employment of weapons. **COREQUISITE:** NAVY 4510.

### NAVY 4510 - Naval Leadership Laboratory

**Credit Hours:** (1) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development

1291 subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

#### NAVY 4520 - Fundamentals of Maneuver Warfare

**Credit Hours:** (3) **Former:** (4410) **Description:** Introduces students to the fundamental terms, concepts, and theories of maneuver warfare. These terms, concepts, and theories will be applied through a historical analysis of combat operations, identifying the evolution of warfighting doctrine, tactics, and technology. Focuses on the evolution of the U.S. Marine Corps into a specialized amphibious force, with particular attention devoted to the structure and capabilities of the present day U.S. Marine Corps as a forward deployed and rapid deployment force and the development of Expeditionary Maneuver Warfare concepts. **COREQUISITE:** NAVY 4510

#### NAVY 4600 - Naval Leadership and Ethics

**Credit Hours:** (3) **Former:** (4402) **Description:** The course integrates an intellectual exploration of Western moral traditions and ethical philosophy with a variety of topics, such as military leadership, core values, and professional ethics; the UCMJ and Navy regulations; and discussions relating to the roles of enlisted members, junior and senior officers, command relationships, and the conduct of warfare. The course provides midshipmen with a foundation of moral traditions, combined with a discussion of actual current and historical events in the United States Navy and Marine Corps, to prepare them for the role and responsibilities of leadership in the naval service of the 21st century. **COREQUISITE:** NAVY 4610.

### NAVY 4610 - Naval Leadership Laboratory

**Credit Hours:** (1) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab.

### NAVY 4710 - Naval Leadership Lab/5th Year

**Credit Hours:** (1) **Description:** Focuses on the fundamentals of leadership and general military training to help prepare prospective Naval officers for service in either the Navy or Marine Corps. Topics cover general Navy/Marine Corps mission and policies, force protection, operational security, watch standing, physical fitness, nutrition, stress management, and other professional development subjects. Consists of a general leadership lab and a specific Navy or Marine Corps lab. \*Navy Laboratory. Focuses on the requisite moral, leadership and physical qualifies for becoming a commissioned officer.

### NURS 3000 - Pharmacology in Nursing \*\*

**Credit Hours:** (3) **Description:** Application of nursing process as it relates to pharmacokinetics, pharmacodynamics and administration of

medications in clinical settings. Three lecture hours per week. **PREREQUISITE:** Admissions to LCON.

# NURS 3005 - Intro Professional Nursing \*\*

**Credit Hours:** (2) **Description:** Essential concepts of the professional nursing role; exploration of nursing's historical, theoretical, philosophical, ethical, and legal dimensions. Two lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106 or satisfy RN admission requirements. **COREQUISITE:** NURS 3006\*.

# NURS 3006 - Professional Nursing Seminar \*\*

**Credit Hours:** (1) **Description:** Discuss, debate, and conceptualize the role of the professional nurse; develop essential skills and strategies necessary for academic, interpersonal and professional success. One lecture hour per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106 or satisfy RN admission requirements. **COREQUISITE:** NURS 3005\*.

# NURS 3051 - Dosage Calculations in Nursing

**Credit Hours:** (1) **Description:** Principles and concepts necessary to calculate safe and accurate medication dosages in the provision of nursing care. **PREREQUISITE:** Admission to the Loewenberg College of Nursing

## NURS 3101 - Health Assessment \*\*

**Credit Hours:** (2) **Description:** Knowledge and skills required to perform a systematic health and physical assessment of patients. Two lecture hours per week. **PREREQUISITE:** admission to LCON. **COREQUISITE:** NURS 3103\*.

# NURS 3103 - Health Assessment Lab

**Credit Hours:** (1) **Description:** Laboratory course focuses on developing skills needed to perform a systematic and individualized health assessment of an adult patient. Three laboratory hours per week. **PREREQUISITE:** Admission to LCON. **COREQUISITE:** NURS 3101\*.

# NURS 3105 - Foundations PT-Centered Care

**Credit Hours:** (3) **Description:** Foundational knowledge and principles of patient-centered nursing care. Three lecture hours per week. **PREREQUISITE:** admission to LCON. **COREQUISITE:** NURS 3106.

# NURS 3106 - Foundational Nursing Skills

**Credit Hours:** (2) **Description:** Nursing skills necessary to provide patient-centered care in clinical practice. Six laboratory hours per week. **PREREQUISITE:** admission to LCON. **COREQUISITE:** NURS 3105\*.

**Credit Hours:** (3) **Description:** Principles and concepts related to mental health nursing emphasizing the roles and functions of the nurse in meeting the needs of patients with psychosocial alterations. Three lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106. **COREQUISITE:** NURS 3129\*.

## NURS 3129 - Mental Health Nurs Practicum

**Credit Hours:** (1) **Description:** Nursing care of patient with alterations in mental health, emphasizing the application of nursing concepts, knowledge, and skills. Six clinical hours per week for seven weeks. Six clinical hours per week for seven weeks. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106. **COREQUISITE:** NURS 3127\*.

# NURS 3205 - Nurs Adult I/Common Hith Alt

**Credit Hours:** (3) **Description:** Concepts and principles necessary to provide patient-centered nursing care to adults with common health alterations. Three lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106. **COREQUISITE:** NURS 3206\*.

### NURS 3206 - Nursing Adult I/Practicum

**Credit Hours:** (3) **Description:** Nursing care of adults with common health alterations, emphasizing the application of nursing concepts, knowledge, and skills. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106. **COREQUISITE:** NURS 3205\*.

# NURS 3217 - Nursing/Childbearing Family

**Credit Hours:** (2) **Description:** Concepts and principles necessary to provide nursing care to childbearing women, neonates, and their families. Two lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129. **COREQUISITE:** NURS 3219\*.

### NURS 3219 - Nurs Childbearing Family Pract

**Credit Hours:** (2) **Description:** Nursing care of childbearing women, neonates and the family emphasizing application of nursing concepts, knowledge and skills. Six clinical hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129. **COREQUISITE:** NURS 3127\*.

# NURS 3227 - Pediatric Nursing

**Credit Hours:** (2) **Description:** Concepts and principles necessary to provide nursing care to newborns, infants, children, adolescents, and their families. Two lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129, NURS 4110, NURS 3217, NURS 3219, NURS 3230, NURS 3231. **COREQUISITE:** NURS 3229\*.

# NURS 3229 - Pediatric Nursing Practicum

Credit Hours: (2) Description: Nursing care of children and families in various settings, emphasizing application of nursing concepts, knowledge, and skills. Six clinical hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129, NURS 4110, NURS 3217, NURS 3219, NURS 3230, NURS 3231. COREQUISITE: NURS 3227\*.

# NURS 3230 - Gerontological Nursing

**Credit Hours:** (3) **Description:** Principles and concepts related to Gerontological nursing, emphasizing the roles and functions of the nurse in meeting the health care needs of the older adult. Three lecture hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129. **COREQUISITE:** NURS 3231\*.

# NURS 3231 - Gerontological Nurs Practicum

Credit Hours: (3) Description: Patient-centered nursing care of the older adult in various care settings, emphasizing application of nursing concepts, knowledge, and skills. Nine clinical hours per week. PREREQUISITE: NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129. COREQUISITE: NURS 3230\*.

# NURS 3305 - Nurs Adult II/Complex HIt Alt

Credit Hours: (3) Description: Concepts and principles necessary to provide patient-centered nursing care to adults with complex multisystem health alterations. Three lecture hours per week. PREREQUISITE: NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129, NURS 4110, NURS 3217, NURS 3219, NURS 3230 NURS 3231. COREQUISITE: NURS 3306\*.

### NURS 3306 - Nurs Adult II/Complex Pract

**Credit Hours:** (3) **Description:** Clinical nursing care of the adult with complex health alterations emphasizing the application of nursing concepts, knowledge, and skills. Nine clinical hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS

1293 3103, NURS 3105, NURS 3106, NURS 3005, NURS 3006, NURS 3205, NURS 3206, NURS 4127, NURS 4129, NURS 3127, NURS 3129, NURS 4110, NURS 3217, NURS 3219, NURS 3230, NURS 3231. **COREQUISITE:** NURS 3305\*.

#### NURS 3317 - Perioperative Nursing

Credit Hours: (1) Description: Theoretical foundation for perioperative practice during the intraoperative phase. PREREQUISITE: NURS 3105, NURS 3106, NURS 3205, NURS 3206, or hold unencumbered RN licensure. COREQUISITE: \*NURS 3319.

### NURS 3319 - Perioperative Nurs Practicum

**Credit Hours:** (2) **Description:** Application of perioperative nursing process with clinical practice in both the scrub/circulating nursing roles. Six clinical laboratory hours per week. **PREREQUISITE:** NURS 3105, NURS 3106, NURS 3205, NURS 3206. **COREQUISITE:** \*NURS 3317.

### NURS 3327 - Oncology Nursing

**Credit Hours:** (3) **Description:** Theory and principles of oncology nursing practice for both pediatric and adult cancer patient. **PREREQUISITE:** NURS 3105, NURS 3106, NURS 3205, NURS 3206, or hold unencumbered RN licensure.

# NURS 3400 - Clinical Pathophysiology \*\*

**Credit Hours:** (3) **Description:** Overview of the pathophysiological processes of selected diseases; etiology, pathogenesis, and clinical manifestations of diseases are emphasized. Three lecture hours per week. **PREREQUISITE:** admission to LCON.

### NURS 3900 - RN-BSN Experiential Learning

**Credit Hours:** (1-4) **Description:** A systematic process for evaluating and credentialing learning gained outside the classroom prior to admittance to the University of Memphis. Presentation of portfolio representative of prior learning required. Credit determined by faculty assessor (S/U).

### NURS 4110 - Evidence Based Practice Nurs \*\*

**Credit Hours:** (3) **Description:** Basic elements of the research process and models of evidence-based nursing practice, emphasizing appraisal and translation of evidence into practice. Three lecture hours per week. **PREREQUISITE:** admission to LCON, EDPR 4541 or PSYC 3110 or SOCI 3311 or MATH 1530.

# NURS 4127 - Community Health Nursing \*\*

**Credit Hours:** (3) **Description:** Overview of community health concepts and theories with emphasis on health promotion, disease prevention, and risk reduction within diverse population. Three lecture

hours per week. **PREREQUISITE:** NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106 or satisfy RN admission requirements. **COREQUISITE:** NURS 4129\*.

# NURS 4129 - Community HIth Nurs Practicum \*\*

**Credit Hours:** (1) **Description:** Clinical course focuses on application of community health nursing concepts emphasizing health promotion and disease prevention in diverse populations. NURS 3000, NURS 3400, NURS 3101, NURS 3103, NURS 3105, NURS 3106 or satisfy RN admission requirements. Six clinical hours for seven weeks. **COREQUISITE:** NURS 4127\*.

High Impact Practice Code: Service Learning

# NURS 4137 - Emergency/Trauma Nursing

**Credit Hours:** (3) **Description:** Application of nursing process with adult clients, significant others, and group experiencing emergency/trauma situations; resuscitation, health maintenance, restoration, and rehabilitation of clients experiencing problems of adaptation requiring acute emergency/trauma levels of care in Emergency Department setting.

# NURS 4205 - Transition Professional Nurs \*\*

**Credit Hours:** (4) **Description:** This course focuses on role transition from the student to professional nursing emphasizing patient-centered care, leadership, evidence-based practice, quality improvement, safety, effective communication, and current issues in nursing practice. Four lecture hours per week. **PREREQUISITE:** all required courses in the BSN curriculum. **COREQUISITE:** NURS 4206\*.

### NURS 4206 - Transition Prof Nurs Practicum \*\*

**Credit Hours:** (4-8) **Description:** This capstone clinical course immerses students in role transition to professional nursing practice. Experiential learning enables the progression from student to registered nurse. Twenty-four laboratory hours per week are required. **PREREQUISITE:** all required courses in the BSN curriculum. **COREQUISITE:** NURS 4205\*.

### NURS 4210 - Health Care Research

**Credit Hours:** (3)

### NURS 4211 - Nursing Leadership/Management\*\*

Credit Hours: (3)

### NURS 4230 - Nursing Content Mastery

**Credit Hours:** (3) **Description:** Synthesis of information obtained throughout the 5 semester nursing program designed to aid in preparing for and successfully completing the NCLEX Exam to become a licensed Registered Nurse. This course will provide the student with

1294 opportunities to improve test taking skills by with online mock tests. Both lecture and online instruction will be utilized. **PREREQUISITE:** completion of all Provider of Care courses.

## NURS 4300-4309 - Special Topics in Nursing.

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings.

### NURS 4319 - Pop Focused Practicum/RNs \*\*

**Credit Hours:** (2) **Description:** Use of nursing and public health theories and principles to provide nursing care to populations within community setting. Practicum experiences are preceptor based with faculty oversight. **PREREQUISITE:** NURS 3108, 3201, 3410, 3420, and unencumbered current RN license. **COREQUISITE:** NURS 4317.

### NURS 4326 - Global Perspectives on Nursing

**Credit Hours:** (3) **Description:** This study abroad program is designed for undergraduate and graduate students interested in increasing their understanding of international health care issues as they relate to nursing.

# NURS 4331 - Nursing/Diverse Culture

**Credit Hours:** (3) **Description:** Cultural concepts and relationship to health and illness of individuals and families; focus on how culture influences nursing roles and clinical decision making in diverse cultures. Tours and lectures provided to highlight salient features of nursing, health care and other points of interest. Travel to selected region required. **PREREQUISITE:** admission to Loewenberg College of Nursing.

### NURS 4335 - Ethical Dialogue \*\*

**Credit Hours:** (3) **Description:** Overview of ethical, ethnic, ancestral, cultural, genetic, and societal issues related to healthcare. **PREREQUISITE:** NURS 3017, 3018, 3019, NURS 3000, NURS 3101, NURS 3400.

### NURS 4800 - Independent Study

**Credit Hours:** (1-3) **Description:** Directed study and/or research in selected areas of nursing. Repeatable May be repeated for maximum of 7 hours credit. **PREREQUISITE:** senior standing and permission of faculty.

### NUTR 2102 - Intro to Dietetics

**Credit Hours:** (2) **Description:** Preparation for a dietetics career; history, trends, future practice; professional ethics. academic process, practitioner roles. career opportunities.

# NUTR 2202 - Nutrition \*\*

High Impact Practice Code: Service Learning

# NUTR 2302 - Introduction to Culinary Nutrition

**Credit Hours:** (3) **Former:** *Intro to Foods* **Description:** Scientific principles of food preparation, culinary techniques, menu planning emphasizing cultural ethnic foods; food safety, food sanitation, computerized nutrient analysis of foods. **COREQUISITE:** NUTR 2303.

# NUTR 2303 - Intro to Culinary Laboratory

**Credit Hours:** (1) **Former:** *Intro to Foods Laboratory* **Description:** Laboratory applications related to scientific principles of food preparation. Three laboratory hours per week. **COREQUISITE:** NUTR 2302.

# NUTR 3000 - Food and Cooking for Wellness

**Credit Hours:** (3) **Description:** Introduction to basic principles of food shopping and preparation, food and kitchen safety and sanitation, healthy cooking methods, and recipe adaptations to improve the nutritional value of meals and the overall health of individuals.

# NUTR 3002 - Advanced Human Metabolism I

**Credit Hours:** (3) **Description:** In-depth study of energy nutrients; generation, storage, and metabolism of energy nutrients; biochemical functions applied to dietetics. **PREREQUISITE:** NUTR 2202, BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021, CHEM 1110/CHEM 1111, CHEM 1120/CHEM 1121.

### NUTR 3202 - Nutrition/Health Care

**Credit Hours:** (3) **Description:** Nutrition applications for health promotion and treatment of selected disease conditions. Required for admission to the Loewenberg School of Nursing at the University of Memphis. **PREREQUISITE:** BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021.

### **NUTR 4000 - Senior Seminar in Dietetics**

**Credit Hours:** (1) **Description:** Preparation for a dietetics career; professional ethics, practitioner roles, career opportunities. Students will practice interviewing skills, prepare an electronic professional portfolio, and prepare a professional application for dietetic internship, graduate school, or professional position.

# NUTR 4001 - 4006 - Special Topics in Nutrition

**Credit Hours:** (3) Repeatable May be repeated with change of topic. See online class listings for topic.

#### 1295 NUTR 4010 - Management and Food Systems

**Credit Hours:** (3) **Description:** Management principles, process and control strategies, roles and responsibilities in food service systems. Application of food preparation and management principles to quantity food production including menu planning, procurement, storage and distribution. Food safety and ServSafe preparation. **PREREQUISITE:** NUTR 2202; ACCT 2010; & MATH 1420.

# NUTR 4102 - Medical Nutrition Therapy I

**Credit Hours:** (3) **Description:** Nutrition care process; nutrition assessment techniques; medical terminology and nutritional pharmacology; nutrition modalities for health promotion and selected conditions. **PREREQUISITE:** BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021, NUTR 2202, NUTR 3002 or permission of instructor.

# NUTR 4112 - Medical Nutrition Therapy II

**Credit Hours:** (3) **Description:** Nutrition care process and pathophysiology for selected conditions; alternative nutrition therapies. **PREREQUISITE:** NUTR 4102.

# NUTR 4212 - Reading/Food/Nutrition

Credit Hours: (1-3) PREREQUISITE: permission of instructor.

# NUTR 4322 - Adv Food/Beverage Mgmt

**Credit Hours:** (3) **Description:** Foundations of managing restaurants and associated beverage operations; planning and control procedures, human resources management, customer service, marketing strategies, emerging technologies; relationship between food and beverage operations and overall hospitality organization. **PREREQUISITE:** NUTR 2302, MGMT 3110, MKTG 3010, or permission of instructor. *Cross listing:* (Same as HPRM 4322).

### NUTR 4332 - Purc/Financl Mgmt/Food System

**Credit Hours:** (3) **Description:** Problem solving related to food and beverage purchasing decisions; budgeting for food services; managerial finance, productivity indicators. **PREREQUISITE:** ACCT 2010, NUTR 3502, and completion of University General Education Program MATH requirement.

### **NUTR 4602 - Community Nutrition**

**Credit Hours:** (3) **Description:** Nutritional issues of diverse community groups; nutrition education skill development; community nutrition resources. program design, and public policy. **PREREQUISITE:** NUTR 2202, or permission of instructor.

NUTR 4605 - Internship

**Credit Hours:** (3) **Description:** Culminating experience allowing students the opportunity to demonstrate knowledge and skills in an appropriate professional setting. **PREREQUISITE:** permission of instructor. (S/U) *Cross listing:* ESMS 4605; HCL 4605; HLSC 4605; PETE 4605

# NUTR 4702 - Food Production Internship

**Credit Hours:** (3) **Description:** Supervised field experience in the field of food production management; preparation for ServSafe, a food safety and sanitation certification.

# NUTR 4722 - Catering Internship

**Credit Hours:** (3) **Description:** Supervised field experience in the field of catering.

#### **NUTR 4802 - Experimental Foods**

**Credit Hours:** (3) **Description:** Technology related to chemical properties of foods and the development of new food products. Critical thinking and problem solving skills used in the preparation and evaluation of food products. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** NUTR 2302, CHEM 3310, EDPR 4541, or permission of instructor.

#### NUTR 4803 - Experimental Foods Laboratory

**Credit Hours:** (1) **Description:** Laboratory applications related to development of new food products.

### NUTR 4812 - Adv Human Metabolism II

Credit Hours: (3) Description: In depth study of vitamin, minerals, phytochemicals; biochemical functions applied to dietetics. **PREREQUISITE:** BIOL 2010/BIOL 2011, BIOL 2020/BIOL 2021; NUTR 3002; CHEM 3310/CHEM 3301.

### NUTR 4902 - Study Tour/Foods/Nutrition

Credit Hours: (1-3) PREREQUISITE: permission of instructor.

### PADM 3100 - Seminar Emergency Mgmt

**Credit Hours:** (3) **Description:** Synthesizing and integrating the various elements of emergency management. *Cross listing:* (Same as EMGT 3100 and ESCI 3100).

### PADM 3610 - Personnel Mgmt Fire Service

**Credit Hours:** (3) **Description:** Personnel practices and management procedures; manpower planning, labor relations recruitment, selection, testing, performance appraisals, classification, motivation, politics, and management.

#### PADM 3611 - Disaster Planning/Control

**Credit Hours:** (3) **Description:** Concepts and principles of community risk assessment, regional and cooperative procedures and plans; relationship of structural, climatic and topographical variables to group fires, conflagrations, and natural disasters; pre- and post-occurrence factors; communications, planning, organizing, coordination, command and logistics.

### PADM 3612 - Fire Preven Org/Mgmt

**Credit Hours:** (3) **Description:** Examines and evaluates techniques, procedures, programs and agencies involved with fire prevention; public and private fire prevention functions, licenses, permits, zoning, legal aspects, inspection, investigations, planning, arson, and incendiary analysis.

### PADM 3613 - Fire/Emergency Admin

**Credit Hours:** (3) **Description:** Overview of organization and management in modern fire service; management of equipment and personnel, fire department functions, planning, resource development, labor relations.

# PADM 3614 - Political/Legl Fnd Fire Prtctn

**Credit Hours:** (3) **Description:** Legal basis for police power of government related to public safety; legal limitations and responsibility; liability of fire prevention organizations and personnel; review of judicial decisions.

### PADM 3615 - Community Risk Reduction

**Credit Hours:** (3) **Description:** Sociological, economic and political characteristics of communities and their influence on fire problem; how to study community profiles and structures with consideration of economic, geographic, and sociological variables of fire threat.; examination of functional basis of community, diverse social roles of community agencies; study of fire services as complex organization in community.

### PHIL 1101 - Intro to Philosophy

**Credit Hours:** (3) **Description:** Introduction to critical exploration of such issues as knowledge, reality, consciousness and the good life; readings from Plato, Descartes, Kant, Nietzsche, or more recent sources. **[G]** 

#### PHIL 1102 - Intro to Ethics \*\*

**Credit Hours:** (3) **Description:** Introduction to such social and ethical questions as, "What makes a happy life? What justifies ideas of good and evil? How should we live with others? What is the role of science, religion, sex, and race in society?" **[G]** 

High Impact Practice Code: Service Learning

# PHIL 1311 - Critical Thinking \*\*

**Credit Hours:** (3) **Former:** (3611) **Description:** Introduction to the appraisal of arguments found in everyday and specialized sources; typical forms of strong and weak reasoning; avoidance or repair of faulty arguments; common problems in statistical, causal and analogical reasoning.

## PHIL 1611 - Elementary Logic \*\*

**Credit Hours:** (3) **Description:** Formal reasoning as a pracical method for problem solving.

# PHIL 3001 - History of Ancient Philosophy \*\*

**Credit Hours:** (3) **Description:** History of philosophy from 7th century B.C. through early Middle Ages structured around major themes that shaped classical period, attention to cultural and historical settings in which they arose and to which they contributed; readings from philosophical and nonphilosophical sources. **PREREQUISITE:** PHIL 1101 or PHIL 1102, or permission of instructor.

# PHIL 3002 - History of Modern Philosophy \*\*

**Credit Hours:** (3) **Description:** History of philosophy from late Middle Ages through 19th century structured around major themes that shaped the modern period; attention to cultural and historical setting in which they arose and to which they contributed; readings from philosophical and nonphilosophical sources. NOTE: while this is a continuation of PHIL 3001, it may be taken separately. **PREREQUISITE:** PHIL 1101 or PHIL 1102, or permission of instructor.

# PHIL 3411 - Contemporary Moral Problems \*\*

**Credit Hours:** (3) **Description:** Such important contemporary moral issues as pornography and obscenity, capital punishment, abortion, human rights, "reverse discrimination," and civil disobedience; underlying philosophical ideas for each issue considered and discussed.

# PHIL 3451 - Existentialism

**Credit Hours:** (3) **Description:** Historical and comparative study of different existentialist writers and their relation to literature, religion, and psychology; readings from such writers as Kierkegaard, Nietzsche, Jaspers, Heidegger, Sartre, and Camus.

# PHIL 3452 - Feminist Theory

**Credit Hours:** (3) **Description:** Selected ideas from the history on women from the Greeks to the present; developing methods and ideologies within contemporary theoretical approaches to feminist studies; diversity, equality and difference discussed by drawing on different epistemologies, such as existentialism and poststructuralism.

# PHIL 3453 - 19th/20th Century Continental

**Credit Hours:** (3) **Description:** Introduction to key figures and movements in 19th and 20th century continental philosophy; phenomenology, hermeneutics, critical theory, deconstruction, poststructuralism, and feminism.

### PHIL 3460 - Nature/Mind/Knowledge

**Credit Hours:** (3) **Description:** The nature of mind, free will vs. determinism, personal identity and immortality, and the nature and possibility of knowledge.

## PHIL 3511 - Ethical Theory

**Credit Hours:** (3) **Description:** Critical analysis of classical ethical theories and their application to problems of individual and society. **PREREQUISITE:** PHIL 1101 or PHIL 1102, or permission of instructor.

## PHIL 3512 - Science/Technology/Human Values

**Credit Hours:** (3) **Description:** Ethical problems growing out of development of modern science and technology; of such issues as relation of science to society, dehumanization of individual, impact of technology on environment, and modern warfare. Specific content of course varies each semester.

## PHIL 3514 - Biomedical Ethics \*\*

**Credit Hours:** (3) **Description:** Discussion of ethical problems raised by contemporary medical practices and biological innovations from standpoint of contemporary ethical theories including abortion, euthanasia, human experimentation and genetic engineering.

## PHIL 3515 - Environmental Ethics \*\*

**Credit Hours:** (3) **Description:** Discussion of ethical problems raised by human interaction with the environment; consideration of such questions as to what kind of entities one can have a duty. Specific issues may include the moral standing of future and possible humans, nonhuman animals, species and ecosystems.

## PHIL 3516 - Philosophy of Law \*\*

**Credit Hours:** (3) **Description:** Philosophical analyses of nature and justification of law, legal reasoning, legal institutions, practices such as punishment.

## PHIL 3550 - Issues in Political Philosophy

**Credit Hours:** (3) **Description:** Introduction to canonical and contemporary issues and thinkers in political philosophy such as the role of the civil state, divine right, social contract theory, individualism, nationalism, fascism, and theocracy, as well as the nature and variety of justice.

## PHIL 3571 - Business Ethics and Society \*\*

The online catalog can be accessed at http://catalog.memphis.edu/index.php

Credit Hours: (3) Description: Examination of ethical issues that arise in interactions between business and society; ethical theory, economic justice, corporate responsibility, and employee rights and obligations.

## PHIL 3621 - Intermediate Logic

Credit Hours: (3) Description: Symbolic logic, including propositional calculus, lower functional calculus, and related topics.

## PHIL 3701 - Human and the Divine

Credit Hours: (3) Description: Examination of one or more major religious movements with regard to their origins, doctrines, and philosophical significance; contrasting conceptions of deity, worship, and role of religion in how we think about ourselves and our roles in society.

# PHIL 3702 - Philosophy of Religion

Credit Hours: (3) Description: Selected religious doctrines and practices from standpoint of philosophy. Topics vary from semester to semester. Sequel to PHIL 3701, but may be taken independently.

# PHIL 3721 - Chinese Philosophy

Credit Hours: (3) Description: Introduction to Chinese philosophy; readings from primary source of Confucianism, Taoism, and Buddhism, supplemented by commentary from contemporary scholarship.

# PHIL 3741 - African American Philosophy

Credit Hours: (3) Description: Philosophical investigation of social and political themes which have developed historically in African American culture such as theories of social elevation, civil disobedience, race and racism, and black feminism.

# PHIL 3751 - Philosophy of Race & Racism

Credit Hours: (3) Description: Investigation of concepts of race and racism as well as related concepts (e.g., racial identity, intersectionality) through an examination of metaphysical, epistemic, phenomenological, psychological, ethical, linguistic, or political problems associated with race.

# PHIL 3771 - Philosophy in Literature

Credit Hours: (3) Description: Expression of philosophical ideas in literature; readings from philosophers, playwrights, novelists and poets.

# PHIL 3772 - Critical Theory

Credit Hours: (3) Description: Exploration of various social and political writings concerning the nature of human agency, intersubjectivity, communication, democratic procedure and practice,

1298 developed during the Enlightenment period and in the philosophies of Kant, Hegel, and Marx, and that were advanced in teh 20th century writings of the Frankfurt School of Social Criticism.

## PHIL 3781 - Philosophy and Film

Credit Hours: (3) Description: An examination of some basic philosophical problems, integrating philosophical readings with films which illustrate positions that have been taken regarding the problems; enhance understanding and appreciation of both the philosophical problems and the films.

### PHIL 3806 - Data Ethics

Credit Hours: (3) Description: A relatively new and rapidly developing field of moral theory, Data Ethics focuses on ethical problems posed by the ever-expanding volume of data that surrounds us, the collection and analysis of large datasets and on the use of "big data." This course will examine select moral problems related to data (including creation/storage, data farming, and usage), algorithms (artificial intelligence, algorithmic bias, etc.) and corresponding practices (responsibility, privacy/surveillance, etc.).

### PHIL 3880 - Problems in Philosophy

Credit Hours: (3) Description: An intensive study of selectied philosophical problems. Repeatable May be repeated for a maximum of 6 hours credit when topic varies.

## PHIL 4211 - Ancient Philosophy

Credit Hours: (3) Description: Readings from primary sources, supplemented by commentary from antiquity and modern scholarship, including Pre-Socratics, Plato, Aristotle, and Hellenistic period. Repeatable May be repeated once when topic varies for an additional 3 credit hours, more with permission of the department director of undergraduate studies. PREREQUISITE: PHIL 3001 or permission of instructor.

## PHIL 4311 - Modern Philosophy

Credit Hours: (3) Description: Readings from major philosophers of 17th to early 19th centuries, supplemented by commentaries from modern and contemporary sources. Repeatable May be repeated once when topic varies for an additioanl 3 hours credit, more with permission of department director of undergraduate studies. PREREQUISITE: PHIL 3002 or permission of instructor.

## PHIL 4421 - Philosophy of Mind

Credit Hours: (3) Description: Major issues and positions in recent philosophy of mind; behaviorism; reductive, non-reductive, and eliminative versions of materialism; functionalism; mental causation; phenomenal consciousness; psychoanalysis and the unconscious; computational and connectionist models of mind. PREREQUISITE: PHIL 1101, PHIL 1102, or PHIL 1611, or permission of instructor.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## PHIL 4422 - Recent Anglo American Phil

**Credit Hours:** (3) **Description:** Major developments in philosophy in England and United States from 1900 to present, reading from such philosophers as Russell, Moore, Ayer, Wittgenstein, James, Dewey, Lewis, Quine and other contemporary authors. **PREREQUISITE:** PHIL 3002 or PHIL 4311 or permission of instructor.

## PHIL 4441 - Recent Continental Philosophy

**Credit Hours:** (3) **Description:** Major figures in 20th Century European thought; phenomenology, existentialism, structuralism, critical theory, and hermeneutics. Repeatable May be repeated once when topic varies for an additioanl 3 hours credit, more with permission of department director of undergraduate studies

# PHIL 4551 - Social and Political Philosophy

**Credit Hours:** (3) **Former:** (3551) **Description:** In depth discussion of major philosophical theories of the individual and the state; emphasis on concepts of society, culture, institutions, government, law, power, authority, rights, and obligations. **PREREQUISITE:** one of PHIL 3411, PHIL 3511, PHIL 3516, 3551, or permission of instructor.

# PHIL 4632 - Advanced Logic

**Credit Hours:** (3) **Description:** Nature of axiomatic systems, techniques of formalization, and logical foundations of mathematics. **PREREQUISITE:** PHIL 3621, or permission of instructor.

## PHIL 4661 - Philosophy of Science

**Credit Hours:** (3) **Description:** Basic features and presuppositions of science; nature of scientific method, theories, explanation, and verification; emphasis on the natural sciences. **PREREQUISITE:** PHIL 1611, or permission of instructor.

## PHIL 4671 - Aesthetics

**Credit Hours:** (3) **Description:** Introduction to philosophical theories and assumptions concerning nature and role of art and possibility of aesthetic evaluation.

# PHIL 4801-4820 - Special Topics In Philosophy

**Credit Hours:** (3) **Description:** Epistemology, metaphysics, philosophy of language, philosophy of mind, logical theory, and axiology. Area to be covered appears in the online class listings the semester it is taught. Repeatable May be repeated for maximum of 15 hours credit without changing an earlier grade if different areas are treated. **PREREQUISITE:** two courses in philosophy or permission of instructor.

## PHIL 4891 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Directed reading and research culminating in a Senior Thesis. Thesis topic to be selected by student with approval of thesis director before semester student intends to take course. Open only to senior honors students in philosophy. Repeatable May be repeated in successive semesters for up to 6 hours credit.

1299

### PHIL 4994 - Reading and Research

**Credit Hours:** (1-3) **Description:** Individual directed study in area of special interest. Repeatable May be repeated in successive semesters for up to 6 hours credit.

### PHED 1003 - Aerobics

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1004 - Jogging

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1005 - Condtn: Varsity Sports

**Credit Hours:** (2) **Description:** Open only to varsity athletes, cheerleaders, and members of the pom pon squad. Repeatable May be repeated for credit. (S/U) **[G]** 

### PHED 1006 - Water Aerobics

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1007 - Yoga Stretching/Relaxation

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

High Impact Practice Code: Service Learning

## PHED 1008 - Walking Health/Fitness

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1009 - Fitness Thru Cross Training

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1010-1019 - Selected Physical Education Activities

**Credit Hours:** (1-3) **Description:** Current activities in physical education. See online class listings for specific activity. Repeatable May be repeated with a change in topic. **[G]** 

## PHED 1020 - Fitness for Beginners

**Credit Hours:** (2) **Description:** Overview of the role of resistance and aerobic exercise in performing activities of daily living and in maintaining personal health. Provides a basic understanding of body movement patterns during exercise and appropriate steps for preventing injury while promoting good healthy habits. Designed for individuals with no or minimal prior formal exercise experience. Can be repeated once for credit. Repeatable Can be repeated once for credit.

## PHED 1107 - Yoga II

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1108 - Universal Survival Tech

**Credit Hours:** (2) **Description:** Learning and application of current research and effective practice; chances for survival in many different climates, weather conditions; emergency situations; development of problem solving skills. Repeatable May be repeated once for credit. **[G]** 

## PHED 1141 - AbLab

**Credit Hours:** (2) **Description:** An experiential approach to the principles of abdominal and core training, improving function, stability and conditioning; health related effects of physical fitness. Repeatable May be repeated once for credit.

## PHED 1301 - Weight Train/Machines

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1302 - Free Weights & Machines

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1305 - Kettlebell

**Credit Hours:** (2) **Description:** A variety of HIIT, muscular/cardiovascular endurance training, and body weight/resistance workouts provide the opportunity for improved fitness level in strength, endurance, and flexibility. Repeatable Class may be repeated once for credit.

# PHED 1331 - Camping

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1333 - Backpacking

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1334 - Rock Climbing

 $\label{eq:credit} Credit\ Hours:\ (2)\ Repeatable\ May\ be\ repeated\ once\ for\ credit.\ [G]$ 

# PHED 1336 - Orienteering

# PHED 1340 - Intro To Fly Fishing

Credit Hours: (2) Repeatable May be repeated once for credit.  $\left[ G \right]$ 

# PHED 1361 - Horseback Riding

Credit Hours: (2) Repeatable May be repeated once for credit.  $\left[ G \right]$ 

### PHED 1412 - Judo

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1413 - Self Defense Techniques

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1414 - Intermediate Judo

**Credit Hours:** (2) **Description:** This is a second course in Judo designed to give students a deeper understanding of the martial art of judo. It will also make students more aware of the benefits of martial arts practice as a part of a healthy lifestyle. A variety of fitness activities will provide the student with the opportunity to improve his/her fitness level.

# PHED 1415 - Crossfit

**Credit Hours:** (2) **Description:** Basic theory and practice regarding CrossFit methodology and training modalities. Hands on experience with CrossFit exercises, workouts, and equipment that are found in most CrossFit gyms around the world.

# PHED 1438 - Mixed Martial Arts

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 1439 - Brazilian Jiujitsu

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 1440 - Muay Thai

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 1441 - Karate

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1442 - Advanced Karate

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1443 - Aikido

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1444 - Kickboxing

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1445 - Tae Kwon Do

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1446 - Tai Chi

**Credit Hours:** (2) **Description:** Basic instruction of the art of Tai Chi, as self-defense and physical practice. History and philosophy of development of Tai Chi; simplified 24-form will be learned and practiced. Repeatable May be repeated once for credit.

### PHED 1447 - Krav Maga

**Credit Hours:** (2) **Description:** Knowledge of basic self-defense techniques and improve fitness; high-energy classes designed to improve fitness with performing the techniques under stress and fatigue. Repeatable May be repeated once for credit.

### PHED 1461 - Modern Fencing

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1463 - Intermed Modern Fencing

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1464 - Padded Weapons

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1500 - Table Tennis

**Credit Hours:** (2) **Description:** This course emphasizes the fundamentals of table tennis or ping-pong as it is often called. Topics include stroke production, scoring, general rules, history, recreational etiquette, point play and match play. Upon course completion, students should be able to adequately enjoy recreational table tennis. NOTE: The class will be set up as a hybrid course, so 50% of the class will attend Tuesday and the other 50% on Thursday.

## PHED 1501 - Beginning Tennis

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1502 - Intermediate Tennis

1301 Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1521 - Racquetball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1522 - Intrmediate Racquetball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1530 - Pickleball

**Credit Hours:** (2) **Description:** Skill development and competency in playing Pickleball; knowledge of rules, history of game. Repeatable Class may be repeated once for credit.

#### PHED 1541 - Badminton

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1561 - Bowling

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1562 - Intermediate Bowling

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1571 - Golf

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1572 - Intermediate Golf

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1710 - Aqua Zumba

**Credit Hours:** (2) **Description:** Through learning and application of current research and effective practice in the activity of aqua zumbe, students with diverse abilities and experience levels are able to increase their knowledge of and appreciation for the activity. Repeatable May be repeated once for credit.

## PHED 1711 - Beginning Swimming I

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1712 - Beginning Swim II

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1713 - Intermediate Swim

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1722 - Swim-Lifeguarding

**Credit Hours:** (2) Repeatable May be repeated once for credit. **PREREQUISITE:** The prerequisite for these courses is Physical Education skills PHED 1713. **[G]** 

# PHED 1742 - Condition Thru Swimming

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1743 - Triathlon Tech/Training

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1744 - PiYo/Pilates/Yoga

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 1745 - ROTC Bootcamp

**Credit Hours:** (2)

### PHED 1771 - Scuba

**Credit Hours:** (2) Repeatable May be repeated once for credit. **PREREQUISITE:** The prerequisite for these courses is Physical Education skills PHED 1713. **[G]** 

## PHED 1772 - Advanced Scuba

**Credit Hours:** (2) Repeatable May be repeated once for credit. **PREREQUISITE:** The prerequisite for these courses is Physical Education skills PHED 1713. **[G]** 

## PHED 1782 - Kayaking

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

#### PHED 1783 - Canoeing

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1784 - Sea Kayaking

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1811 - Rhythms For Elem Sch

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1814 - Basic Dance Rhythms

1302 Credit Hours: (2) Repeatable May be repeated once for credit. [G]

# PHED 1815 - Hip Hop

**Credit Hours:** (2) **Description:** This course is designed to improve the student's current fitness level by aerobic activity specifically Hip Hop. The student will learn how to perform and sweat to various Hip Hop routines.

### PHED 1921 - Basketball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1923 - Volleyball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1924 - Intermediate Volleyball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1925 - Beach Volleyball

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

### PHED 1926 - Rugby

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 1927 - Rhythms Exercise Danc

**Credit Hours:** (2) **Description:** Introduction to a novel and holistic form of fitness that integrates rhythms and dance movements from diverse cultures around the world with contemporary fitness goals (i.e., flexibility and strength training, cardiovascular health, etc.) and broader health and wellness goals (i.e., integration and balance of mind and body, emotional balance, social cohesion, etc.). This course involves instruction, demonstration, and active participation.

## PHED 1931 - Soccer and Fieldsports

Credit Hours: (2) Repeatable May be repeated once for credit. [G]

## PHED 1932 - Zumba

Credit Hours: (2) Repeatable May be repeated once for credit.

## PHED 2703 - Teaching Swimming and WSI

**Credit Hours:** (3) **Description:** Analysis, practice, and teaching of swimming and lifesaving skills and general water safety practice. Variable hours of supervised laboratory/field experience will be required. Repeatable May be repeated once for credit. **PREREQUISITE:** experienced swimmer.

## PHED 3406 - Lifeguarding Instructors

**Credit Hours:** (3) **Description:** Theory and application of lifeguarding skills, pool management, records/reports, pool maintenance and sanitation. **PREREQUISITE:** PHED 1722 or Red Cross Lifesaving certificate; HMSE 2102 or Red Cross or Heart Association CPR/Basic Life Support. \*The prerequisite for these courses is Physical Education skills PHED 1713.

# **PETE 2000 - Introduction to PETE**

**Credit Hours:** (3) **Description:** Exploration of the discipline of Physical Education through historical, philosophical, sociological, and scientific bases.

# **PETE 2001 - Individual Fitness Teaching**

**Credit Hours:** (3) **Description:** Knowledge, skills and techniques of teaching fitness; individual skill development; competency in instructional techniques of teaching fitness in school settings.

# PETE 2002 - Ed Games/Team Sport Skill

**Credit Hours:** (3) **Description:** Knowledge, skills, techniques of teaching educational games and team sports; individual skill development; competency in instructional techniques of teaching educational games in school settings.

# PETE 2003 - Skill Competence in Individual Sports

**Credit Hours:** (3) **Description:** Concepts and practices for teaching pickle ball, golf, badminton skills, and game play to secondary students using the Sport Education instructional model. Students learn how to 1) use technology for instruction and as an assessment tool, 2) develop individual motor skills in students based on assessment data, and 3) develop personal competency in using instructional techniques of teaching educational games in school settings.

# **PETE 2010 - Educational Dance and Gymnastics**

**Credit Hours:** (3) **Description:** Concepts and practices associated with understanding skills, activities, and resource materials for teaching elements of movement, techniques, educational dances, fitness, and gymnastics to K-12 students. Students will learn how to 1) devise developmentally appropriate lessons and activities, and 2) demonstrate knowledge of basic skills and instructional techniques in dance, educational movement, and gymnastics. *Cross listing:* NA

# PETE 3307 - Psychosocial Aspect of Sport\*\*

**Credit Hours:** (3) **Former:** (EXSS 3307) **Description:** Designed to help students develop understanding of psychological aspects of participation in sport; emphasis on research and theoretical frameworks related to performance enhancement and enjoyment in sport.

# PETE 3308 - Exceptional Learner Phys Ed

**Credit Hours:** (3) **Former:** (EXSS 3308) **Description:** Nature and etiology of disabilities prevalent in children, knowledge and technical skills pertinent to the design of adapted physical activity programs and the teaching of physical activities for specific disabilities.

1303

# PETE 3400 - Coaching Team/Individual Sports

**Credit Hours:** (3) **Description:** Principle concepts of coaching team and individual sports. Basic tools for coaching team sports (e.g., Basketball, Soccer, Baseball/Softball, etc.) and individual sports (e.g., Golf, Tennis, Track & Field, etc.). Tools for planning practices and games, maximize learning opportunities for athletes, and managing non-playing activities for teams. *Cross listing:* NA

# PETE 3450 - Motivation in Athletics and Coaching

**Credit Hours:** (3) **Description:** Concepts and practices related to psychological and motivational principles linked to coaching effectiveness and athlete success. Fundamental practices used to assess students' motivational needs through a self-determined approach. Concepts of tool development for facilitating goal-setting, team cohesion, mental training, and coping. Practices used to increase motivation, reduce stress, and maximize athlete potential. *Cross listing:* NA

# PETE 3500 - Sports Performance Training for Coaches

**Credit Hours:** (3) **Description:** Information and tools for the emerging pre-service professional in sport coaching based on how to best physically train future athletes for optimal performance. Evidence-based solutions for maximizing sports performance in a safe, personalized manner. *Cross listing:* NA

# PETE 3550 - Sports Officiating Techniques

**Credit Hours:** (3) **Description:** Officiating techniques for sports and games with an emphasis on mechanics, rule interpretation, and enforcement. Provides future coaches and officials with an in depth understanding of the officiating profession. Explore topics such as the current state of officiating, officiating as a career, developing a variety of officiating skills, responsibilities of an official on and off the field, officiating philosophy development, and the psychology of officiating. *Cross listing:* NA

# PETE 3600 - Sport Coaching Administration and Leadership

**Credit Hours:** (3) **Description:** Concepts and practices for future coaching administrators to address typical challenges and problems. Critical discussions of philosophical perspectives and ethical issues pertinent to the administration and management of sport teams. Extensive overview of leadership responsibilities, duties, and behaviors within the coaching profession. *Cross listing:* NA

## PETE 3604 - Teach Phys Ed/Health/K-Middle

**Credit Hours:** (2) **Former:** (EXSS 3604) **Description:** Skills, activities, and resource materials for teaching elements of movement, educational games, educational gymnastics, and physical fitness to youth.

# PETE 3800 - Instr Strategies Phys Ed

**Credit Hours:** (3) **Description:** Emphasis on development and application of developmentally appropriate instructional strategies in school based physical activity settings. Students initiate Professional Development Portfolios (PDF) and must be accepted into the Teacher Education Program to enroll in this course.

## PETE 3903 - Hist/Phil Aspect/Phys Activity

**Credit Hours:** (3) **Description:** Development of the discipline of physical education through historical, philosophical, sociological and scientific bases. **PREREQUISITE:** Upper division standing and satisfactory completion of the English composition requirements.

# PETE 4200 - Curr/Integrate Learn Elem PE

**Credit Hours:** (4) **Description:** Emphasis on development and implementation of developmentally appropriate curriculum in early childhood and elementary school physical activity settings. Part of PETE Instructional Block taken in the Fall of Senior year. Block courses may be taught in local Professional Development Schools. **COREQUISITE:** PETE 3800, PETE 4300, and PETE 4400.

## PETE 4201 - Curr/Integ Learn/EI PE Well

**Credit Hours:** (3) **Description:** Emphasis on development and implementation of appropriate curriculum in early childhood and elementary school physical activity and wellness settings. **PREREQUISITE:** admission to TEP. **COREQUISITE:** PETE 4301/PETE 4401, PETE 4501.

# PETE 4300 - Curr/Aspect Lrng Secondary Ed

**Credit Hours:** (4) **Description:** Teaching strategies, management techniques, curricula planning, evaluation and research for effective physical education teaching in grades 7-12. Part of PETE Instructional Block taken in the Fall of Senior year. Block course may be taught in local Professional Development Schools. Students must be accepted into the Teacher Education Program to enroll in this course. **COREQUISITE:** PETE 3800, PETE 4200, and PETE 4400.

# PETE 4301 - Curr/Integ Learn/Sec PE/Well

**Credit Hours:** (3) **Description:** Teaching strategies, management techniques, curricula planning, evaluation and research for effective physical education and wellness instruction in grades 7-12. **PREREQUISITE:** admission to TEP. **COREQUISITE:** PETE 4201/PETE 4401, PETE 4501.

**Credit Hours:** (3) **Description:** Emphasis on assessment techniques, tools, resources and their application to assessment in school based physical activity programs. Part of PETE Instructional Block taken in the Fall of Senior year. Block courses may be taught in local Professional Development Schools. Students must be accepted into the Teacher Education Program to enroll in this course. **COREQUISITE:** PETE 3800, PETE 4200, and PETE 4300.

## PETE 4401 - Learner Assessment PE/Well

**Credit Hours:** (3) **Description:** Assessment techniques, tools, resources and their application to assessment/evaluation in schoolbased physical activity and wellness programs. **PREREQUISITE:** admission to TEP. **COREQUISITE:** PETE 4201/PETE 4301; PETE 4501.

## PETE 4501 - Residency I Practicum PE/Well

**Credit Hours:** (5) **Description:** Clinical teaching experience in Physical Education and Wellness at an assigned Residency I school during Fall semester, senior year. **PREREQUISITE:** admission to TEP, all other coursework required for program completed. **COREQUISITE:** PETE 4201/PETE 4301/PETE 4401.

## PETE 4601 - Residency II Seminar PE/Well

**Credit Hours:** (3) **Description:** Senior semester taken concurrently with Residency II which requires students to analyze and seek solutions to problems encountered in current practices and issues in education and specific to physical education. **PREREQUISITE:** PETE 4201/PETE 4301/PETE 4401; PETE 4501. **COREQUISITE:** PETE 4701.

## PETE 4605 - Internship

**Credit Hours:** (3-9) **Description:** Culminating experience allowing students the opportunity to demonstrate knowledge and skills in an appropriate professional setting. **PREREQUISITE:** senior status and permission of advisor and coordinator of internships; First Aid and CPR certification. (S/U) *Cross listing:* ESMS 4605; HCL 4605; HLSC 4605; NUTR 4605

## PETE 4701 - Residency II Practicum PE/Well

**Credit Hours:** (9) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization; synthesize knowledge and skills; demonstrate professional competencies in educational settings. **PREREQUISITE:** PETE 4201/PETE 4301/PETE 4401; PETE 4501. **COREQUISITE:** PETE 4601.

## PETE 4800 - Prof Seminar Leaders PE

**Credit Hours:** (3) **Description:** Senior seminar taken concurrently with student teaching which requires student to analyze and seek solutions to problems encountered in current practices and issues in education and specific to physical education; integrate and synthesize knowledge and experiences in development of role as professional education leader. The student's Professional Development Portfolio (PDP) is assessed as part of this course. Student must be accepted into the Teacher Education Program to enroll in this course. **COREQUISITE:** student teaching.

# PETE 4909 - Student Teaching in PETE

**Credit Hours:** (9) **Description:** Full-time planned and supervised experience in a setting appropriate to student's area of specialization; synthesize knowledge and skills; demonstrate professional competencies in educational settings. **PREREQUISITE:** approval from Teacher Education Director. **COREQUISITE:** PETE 4800.

# PHYS 1001 - Introductory Physics Lab

**Credit Hours:** (1) Fee Lab Fee: \$15. Laboratory experiments and techniques to accompany PHYS 1010. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** PHYS 1010. **[G]** 

# PHYS 1002 - Astronomy Laboratory

**Credit Hours:** (1) Fee Lab Fee: \$15. Laboratory experiments and techniques to accompany PHYS 1020. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** PHYS 1020. **[G]** 

# **PHYS 1010 - Introductory Physics**

**Credit Hours:** (3) **Description:** Phenomenological introduction to physics for non-technical students, providing an understanding of natural laws of motion, structure of matter, heat, sound, electromagnetics, light, atomic and nuclear physics. PHYS 1001 must be taken concurrently to satisfy the General Education Program requirement. Three lecture hours per week. **[G]** 

# PHYS 1020 - Survey of Astronomy I

**Credit Hours:** (3) **Description:** Motions of earth and moon; apparent motion of stars and planets; orbits and properties of bodies in the solar system; stellar distances, properties, and evolution; our galaxy and others. NOTE: PHYS 1002 must be taken concurrently to satisfy the General Education Program requirement. Three lecture hours per week. **[G]** 

## PHYS 1031 - Astronomy II Laboratory

**Credit Hours:** (1) **Description:** Laboratory for PHYS 1301. **PREREQUISITE or COREQUISITE:** PHYS 1301 [G]

## **PHYS 1040 - Introduction to Careers in Physics**

**Credit Hours:** (1) **Description:** Overview of careers in physics, research opportunities in the Physics department, and special skill for success in physics. This couse does not count toward the credit hours for the major or minor in physics.

1305

## PHYS 1301 - Astronomy II

**Credit Hours:** (3) **Description:** Our Sun and other stars, surveying the stars, Star properties, star life cycle, Our galaxy and other galaxies, the birth of the universe, Dark matter, dark energy, and fate of the universe, Life in the universe, life on earth and beyond. **PREREQUISITE:** PHYS 1020 **[G]** 

## PHYS 2010 - General Physics I

**Credit Hours:** (3) **Description:** Mechanics, heat, and sound. This course is recommended for students in pre-medical programs. NOTE: For first-time enrollees, PHYS 2011 must be taken concurrently. Three lecture hours per week. **PREREQUISITE:** MATH 1720 or MATH 1730 or MATH 1830 or MATH 1910.

## PHYS 2011 - General Physics Lab I

**Credit Hours:** (1) Fee \$15. Laboratory experiments and techniques to accompany PHYS 2110. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** PHYS 2010.

## PHYS 2020 - General Physics II

**Credit Hours:** (3) **Description:** Continuation of PHYS 2010. Magnetism, electricity, light, and modern physics. Recommended for students in pre-medical programs. NOTE: for first-time enrollees, PHYS 2021 must be taken concurrently Three lecture hours per week. **PREREQUISITE:** PHYS 2010.

## PHYS 2021 - General Physics Lab II

Credit Hours: (1) Fee \$15. Laboratory experiments and techniques to accompany PHYS 2020. Two laboratory hours per week. PREREQUISITE: PHYS 2011 PREREQUISITE or COREQUISITE: PHYS 2020

# PHYS 2110 - Physics for Scientists and Engineers I

**Credit Hours:** (3) **Description:** Principles of mechanics using methods of calculus; kinematics, Newton's laws of motion, work, kinetic and potential energies, momentum and collisions, rotational motion, and fluid mechanics. NOTE: For first-time enrollees, PHYS 2111 must be taken concurrently. Three lecture hours per week. **COREQUISITE:** MATH 1910 or MATH 1421.

# PHYS 2111 - Sci/Engr Phys Lab I

**Credit Hours:** (1) Fee \$15. Laboratory experiments and techniques to accompany PHYS 2110. Two laboratory hours per week. **PREREQUISITE or COREQUISITE:** PHYS 2110 [G]

# PHYS 2120 - Physics For Scientists and Engineers II

**Credit Hours:** (3) **Description:** Continuation of PHYS 2110. Principles of electromagnetism using methods of calculus; Gauss's Law, current, resistance, capacitance, Faraday's Law, inductance, geometric optics. NOTE: for first-time enrollees, PHYS 2121 must be taken concurrently. Three lecture hours per week. **PREREQUISITE:** PHYS 2110. **COREQUISITE:** MATH 1920 or MATH 2421. The Physics Department recommends that students take MATH 1920 before PHYS 2120.

# PHYS 2121 - Sci/Engr Phys Lab II

Credit Hours: (1) Fee \$15. Laboratory experiments and techniques to accompany PHYS 2120. Two laboratory hours per week. PREREQUISITE: PHYS 2111 PREREQUISITE or COREQUISITE: PHYS 2120 [G]

## PHYS 2130 - Intermediate Physics

**Credit Hours:** (4) **Description:** Fluids, temperature, heat, mechanical and electrical oscillations, waves, geometric optics and wave optics. Three lecture hours, one laboratory hour per week. **PREREQUISITE:** PHYS 2120.

# PHYS 2990 - Research in Physics I

**Credit Hours:** (1) **Description:** Introduction to research in physics; how questions are developed; literature search; MATLAB; data analysis and dimensional analysis. **PREREQUISITE:** PHYS 2110 and PHYS 2111.

# PHYS 3010 - Introduction to Modern Physics

**Credit Hours:** (3) **Description:** Special relativity; experimental origin of quantum theory; atomic structure and spectral lines; matter-wave duality; Schrodinger equation; particle in a rigid box; electron spin; structure of atomic nuclei; radioactivity and nuclear reactions. Three lecture hours per week. **PREREQUISITE:** PHYS 2120 **COREQUISITE:** MATH 2110

# PHYS 3011 - Methods of Theoretical Physics- I

**Credit Hours:** (3) **Description:** Infinite series, complex variables, linear algebra, vector analysis, Fourier series, and calculus of variations. Three lecture hours per week. **COREQUISITE:** MATH 2120.

# PHYS 3012 - Methods of Theoretical Phys II

1306 Credit Hours: (3) Description: Continuation of PHYS 3011 covering integral transforms, tensors, group theory, special function and probability theory. Three lecture hours per week. PREREQUISITE: PHYS 3011.

# PHYS 3050 - Introductory Astronomy and Astrophysics

Credit Hours: (3) Description: Matter and radiation, the solar system, stellar structure and evolution, galaxies, active galactic nuclei, galaxy formation and evolution, and introduction to cosmology. PREREQUISITE: PHYS 2120 or 2020 COREQUISITE: PHYS 3051 Intermediate Astronomy Lab

## PHYS 3051 - Intermediate Astronomy Lab

**Credit Hours:** (1) **Description:** This laboratory class provides the experimental portion of the Intermediate Astronomy lecture **PREREQUISITE:** PHYS 2120 / 2020 **COREQUISITE:** PHYS 3050

## PHYS 3052 - Life in the Universe

**Credit Hours:** (3) **Description:** An overview of observational techniques and experiments designed to detect life in the Universe. Characteristics of the planets in the solar system, detection of extrasolar planets, stellar evolution, habitable zone, origin and evolution of life on Earth, extremophiles (life in extreme environments), and SETI experiments. **PREREQUISITE:** PHYS 2120 or 2020

# PHYS 3053 - Observational Astronomy

**Credit Hours:** (3) **Description:** Aspects of astronomical instrument design and methods to detect radiation and gravitational waves. The electromagnetic spectrum, geometric optics, diffraction, light detection, data acquisition and signal processing. Transmission of the atmosphere and fundamentals limits of detection, modern detectors from radio to Gamma-ray range, adaptive optics, spectroscopy, archival computer astronomy, use of astronomical databases. **PREREQUISITE:** PHYS2120 or PHYS2020

## PHYS 3060 - Advanced Physics Methodology

**Credit Hours:** (3) **Former:** (4060) **Description:** Advanced fundamental experiments in physics that focus on the underlying physical principles, the scientific methodology of experimental research, and detailed error analysis. Six laboratory hours per week. **PREREQUISITE:** PHYS 3010.

# PHYS 3111 - Mechanics I

**Credit Hours:** (3) **Description:** Introduction to fluid mechanics, Newtonian mechanics, oscillations, gravitation, introduction to Hamilton's principle, and Lagrangian/Hamiltonian mechanics. **PREREQUISITE:** PHYS 2120, PHYS 3011, and MATH 2120.

# PHYS 3211 - Electricity and Magnetism-I

**Credit Hours:** (3) **Former:** (*Electricity/Magnetism I*) **Description:** Electric fields and potentials, capacitance, dielectric materials, magnetic fields, magnetic properties of materials, electromagnetic induction, inductance, Maxwell's equations, and electromagnetic waves. **PREREQUISITE:** PHYS 2120, PHYS 3011, and MATH 2120.

# PHYS 3990 - Research in Physics II

**Credit Hours:** (2) **Description:** Laboratory safety; MATLAB and tools of data analysis. Students execute a research project under guidance of physics faculty member; present results and reports on research projects; introduced to process of peer review. Four laboratory hours per week. **PREREQUISITE:** PHYS 2990

# PHYS 4000-4009 - Special Topics in Physics

**Credit Hours:** (3) **Description:** Selected topics of current interest in physics not otherwise included in the curriculum. Three lecture hours or equivalent laboratory hours per week. **PREREQUISITE:** permission of instructor.

# PHYS 4020 - Soft Matter and Biological Physics

**Credit Hours:** (3) **Description:** Random walks, diffusion, entropic forces, colloidal suspensions, polymers, self-assemblies, lipid membranes, transitions in biomolecules, molecular machines in biomembranes. **PREREQUISITE:** PHYS 2120 and CHEM 1120.

# PHYS 4021 - Applied Radiation Physics

**Credit Hours:** (3) **Description:** Applied radiation and radioactivity; types of radiation, radiation measurement interaction with matter, and biological effects; radiation safety aspects emphasized. Three lecture hours per week. **PREREQUISITE:** PHYS 2120 or PHYS 2020 and MATH 1910.

# PHYS 4040 - Medical Physics

**Credit Hours:** (3) **Description:** Physics of sensory, respiratory, and circulatory systems; physical basis of radiology and nuclear medicine. Three lecture hours per week. **PREREQUISITE:** PHYS 2120 or both PHYS 2020 and MATH 1910.

# PHYS 4050 - Astrophysics I

**Credit Hours:** (3) **Former:** (3051) **Description:** Principles of physics applied to the solar system, stars, light, telescopes. Recommended for science and engineering majors interested in astronomy. Three lecture hours per week. **PREREQUISITE:** PHYS 2120 or both PHYS 2020 and MATH 1910.

## PHYS 4051 - Astrophysics II

**Credit Hours:** (3) **Description:** Principles of physics applied to star birth and death, black holes, neutron stars, galaxies, quasars, beginning and evolution of the universe. Three lecture hours per week. **PREREQUISITE:** PHYS 4050.

## PHYS 4055 - Stellar and Galactic Astronomy

**Credit Hours:** (3) **Description:** Introduction to galactic objects including stars and stellar systems. Initial stages of stellar evolution (protostars, T Tauri stars) and final stages (degenerate and collapsed stars, novae and supernovae). Galactic and planetary nebulae and their relation to stars. Interstellar medium. The black hole at the center of the Milky Way. **PREREQUISITE:** PHYS 3050

# PHYS 4056 - Extragalactic Astronomy

**Credit Hours:** (3) **Description:** Types of galaxies, galaxy mergers, supermassive black holes, unification models of active galactic nuclei, quasars and galaxy clustering. Hubble law, expansion of the universe, dark matter and dark energy, cosmic microwave background and observational constraints on the Big Bang. Fee none **PREREQUISITE:** PHYS 3050

## **PHYS 4110 - Nuclear and Particle Physics**

**Credit Hours:** (3) **Description:** Properties of atomic nuclei, radioactive transitions, alpha, beta, and gamma decay; binding energy, nuclear forces and nuclear models. Three lecture hours per week. **PREREQUISITE:** PHYS 3010.

## PHYS 4112 - Mechanics II

**Credit Hours:** (3) **Description:** Hamilton's principle and Lagrangian/Hamiltonian dynamics, central force motion, dynamics of systems of particles, rigid body motion, and fluid dynamics. **PREREQUISITE:** PHYS 3111.

## PHYS 4211 - Waves and Optics

**Credit Hours:** (3) **Description:** Mathematical description of vibrations and waves with application to sound and electromagnetic waves; interference and diffraction; holography; introduction to laser physics, Non-linear optics, fiber optics, optoelectronics, holography and photonics. **PREREQUISITE:** PHYS 3211.

# PHYS 4212 - Electric/Magnetism II

**Credit Hours:** (3) **Former:** (3212) **Description:** Continuation of PHYS 3211. Three lecture hours per week. **PREREQUISITE:** PHYS 3211.

# PHYS 4222 - Environmental Physics

**Credit Hours:** (3) **Former:** (3410) **Description:** Application of gas laws, transport laws, and heat transfer in environmental processes; environmental radiation (solar and terrestrial), energy system of

atmosphere and hydrosphere, and energy resources and their impact upon environment. Three lecture hours per week. **PREREQUISITE:** PHYS 2020 or PHYS 2120.

## PHYS 4230 - Electronics

**Credit Hours:** (4) **Former:** (3510) **Description:** Theory and application of electronics devices, emphasis on scientific instrumentation. Covers principles of analog circuit theory and design, linear systems theory, and practical aspects of circuit realization and characterization. Laboratory oriented course including signal processing, instrument control, and data acquisition. Three lecture hours, three laboratory hours per week. **PREREQUISITE:** PHYS 2120.

## PHYS 4300 - Advanced Topics in Astronomy

**Credit Hours:** (3) **Description:** Supermassive black holes and galaxy evolution; Curvature of space, general relativity, gravitational lensing, accretion onto black holes, formation of jets and radio lobes, cosmological evolution of black holes, intermediate mass black holes, coevolution of black holes and galaxies, feeding and feedback of black holes. **PREREQUISITE:** PHYS3050

## PHYS 4410 - Introduction to Quantum Mechanics

**Credit Hours:** (3) **Description:** Historical background of quantum theory, mathematical formalism of quantum mechanics, solutions of Schrodinger equation for bound and scattering states, wave packets, harmonic oscillator, angular momentum and selected applications in atomic, molecular and optical physics. **PREREQUISITE:** PHYS 3010 and PHYS 3011.

# PHYS 4420 - Introduction to Computational Physics

**Credit Hours:** (3) **Description:** Introduction to computer-based techniques for modeling physical systems. Computational methods are used to solve problems in mechanics, electricity and magnetism, and quantum mechanics. **PREREQUISITE:** PHYS 3010 and PHYS 3011.

## PHYS 4510 - Thermal and Statistical Physics

**Credit Hours:** (3) **Description:** Introduction to thermodynamics and statistical mechanics, includes topics such as temperature, work, heat, entropy, thermodynamic potentials, ideal gases, phase transitions, classical and quantum ensembles, and partition functions. **PREREQUISITE:** PHYS 2120 and PHYS 3011.

## PHYS 4610 - Solid State Physics

**Credit Hours:** (3) **Description:** Crystal structures, crystal bonding, xray diffraction, lattice vibrations and phonons, free and nearly-free electron models, energy bands of insulators, metals, and semiconductors. **PREREQUISITE:** PHYS 4410 **Credit Hours:** (3) **Description:** Semiconductor devices and microfabrication; crystal properties and growth of semiconductors, energy bands and charge carriers, p-n junction, field-effect transistors, bipolar transistors, optoelectronic devices, power devices, power devices, and fundamentals of microfabrication, including vacuum technology and thin film deposition techniques. **PREREQUISITE:** PHYS 3211, PHYS 3010, PHYS 3011.

## PHYS 4720 - Materials Physics

**Credit Hours:** (3) **Description:** Basic concepts in materials science emphasizing relationships between microscopic structure and properties; crystallography and symmetries, thermodynamics of material, phase equilibria, structure of ceramics and polymers, mechanical properties of material, kinetics of phase transformations in materials. **PREREQUISITE:** PHYS 3010. Open only to students in the Materials Science concentration within the Physics major.

## PHYS 4820 - Materials Physics Lab

**Credit Hours:** (3) **Description:** Synthesis of various materials and characterizations of their structure and properties using a variety of experimental tools; relationships between structure of materials and their properties are emphasized. **PREREQUISITE:** PHYS 3010. Open only to students in the Materials Science concentration with the Physics major.

## PHYS 4910 - Seminar

**Credit Hours:** (1) **Description:** Students enrolled in this course are required to attend all weekly seminars in the Physics Department, and submit weekly short reports on the seminars attended. Open only to Physics majors. May be repeated for a maximum of 2 credit hours.

# PHYS 4911 - Senior Honors Seminar

**Credit Hours:** (1) **Description:** Special projects, reports and investigation of current literature and research. The student will give a seminar presentation based on the original honors research work completed in PHYS 4991/PHYS 4992. Open only to senior honors students in physics. COREQUISITE: PHYS 4992.

## PHYS 4990 - Research in Physics III

**Credit Hours:** (3) **Description:** Continuation of PHYS 3990. Original experimental, theoretical, or computational research work under the supervision of a faculty member. Students are expected to complete a prospectus in collaboration with a faculty member before enrolling in the course. Students are expected to give short oral presentations and written reports at the end of the course. Six laboratory hours per week. **PREREQUISITE:** PHYS 3990.

# PHYS 4991 - Honors Research/Phys I

**Credit Hours:** (3) **Description:** Original scholarly work in physics under the direction of honors research advisor. This work is the continuation of research begun in PHYS 3610/3611. Ten laboratory or equivalent hours per week. Open only to honors students in physics. **PREREQUISITE:** PHYS 3611, and permission of instructor.

# PHYS 4992 - Honors Research/Phys II

**Credit Hours:** (3) **Description:** Completion of original scholarly work under the direction of honors research advisor. Ten laboratory or equivalent hours per week. Open only to honors students in physics. **PREREQUISITE:** PHYS 4991, and permission of instructor.

# PHYS 4994 - Research in Materials Physics

**Credit Hours:** (3) **Description:** Original experimental, computational or theoretical research under supervision of faculty member engaged in materials physics research. Eight laboratory hours per week. Students are expected to give short oral presentations and written reports at the end of the course. Open only to students in Materials Science concentration within the Physics major. **PREREQUISITE:** PHYS 3010 and permission of instructor.

# PHYS 4999 - Senior Honors Thesis

**Credit Hours:** (1) **Description:** Directed reading and background research culminating in a senior thesis based on original research completed in PHYS 4991/PHYS 4992. Open only to honors students in physics. COREQUISITE: PHYS 4992.

# POLS 1030 - American Government\*\*

**Credit Hours:** (3) **Former:** (1100) **Description:** Development, structure, and processes of American system of government, including framing principles of U.S. Constitution and Bill of Rights; structure and roles of President, Congress, and Supreme Court, and citizen participation in governing. **[G]** 

# POLS 1101 - Intro Ancient Political Thgt \*\*

**Credit Hours:** (3) **Description:** Inquiry into fundamental questions of ancient political thought, such as: Who should rule? What is justice? What is a good political order? What are the duties of citizens? What is the foundation of morality? **[G]** 

# POLS 1102 - Intro Modern Political Thought \*\*

**Credit Hours:** (3) **Description:** Inquiry into fundamental questions of modern political thought, such as origin of political society, proper rights of citizens, legitimate purposes of government, meaning of justice and good society. **[G]** 

# POLS 1301 - Intro to Comparative Politics \*\*

1309 **Credit Hours:** (3) **Former:** (2301) **Description:** Comparison of institutions, issues, processes and policies in a variety of political systems ranging from European to Asian or African countries. **[G]** 

# POLS 1501 - International Relations\*\*

**Credit Hours:** (3) **Former:** (2501) **Description:** Consideration of all major forms of political interaction (conflict competition, and cooperation) between and among global actors in world arena. **[G]** 

# POLS 3102 - Religion and Politics

**Credit Hours:** (3) **Description:** Survey of role of religion and religious belief in politics; emphasizes role of religious institutions in international arena and national politics and effects of religion on behavior and political beliefs. **PREREQUISITE:** POLS 1030, or POLS 1101, or POLS 1102, or permission of instructor.

# POLS 3211 - State/Local Government

**Credit Hours:** (3) **Description:** Role of state governments in Federal System, political institutions, elections; organization, functions, and problems of state government; emphasis on Tennessee government. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 3213 - Intro to Public Policy \*\*

**Credit Hours:** (3) **Description:** Public policy formulation process and some of the major substantive areas of policy concern in America; emphasis on framework for identifying and analyzing substance of public problems, policy making and policy administration. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 3215 - Interest Groups/Amer Politics

**Credit Hours:** (3) **Description:** Role and impact of interest groups within American political system, including group theory, tactics, and group relationships with various governmental institutions. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 3216 - Political Parties/Elections \*\*

**Credit Hours:** (3) **Description:** Political parties and elections in the American political system; emphasis on party organization and activities, campaign strategies and techniques, voting behavior, and two-party system. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 3217 - The Political Media \*\*

**Credit Hours:** (3) **Description:** Interactions between the political world and the commercial media, emphasizing the variety of methods used by political elites to influence political perceptions. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 3218 - The American Presidency

**Credit Hours:** (3) **Former:** (4219) **Description:** Contemporary American presidency; Constitutional roots for growth of presidential power; roles of persuasion, reputation, and prestige in shaping foreign and domestic policy; presidential elections; conflicts between executive, legislative, and judicial branches. **PREREQUISITE:** POLS 1030, or permission of instructor.

## POLS 3219 - Judicial Process \*\*

**Credit Hours:** (3) **Description:** Judicial selection, civil and criminal trial procedure, organization of state and federal courts, U.S. Supreme Court decision making process; issues surrounding judicial review. **PREREQUISITE:** POLS 1030, or permission of instructor.

## POLS 3220 - U. S. Congress

**Credit Hours:** (3) **Description:** Origins, organization, functions, and activities of the U.S. Congress. **PREREQUISITE:** POLS 1030, or permission of instructor.

## POLS 3221 - Public Opinion

**Credit Hours:** (3) **Description:** Exploration of political attitudes and behavior; examination of such topics as sources of political knowledge; how political attitudes are formed and changed; how public opinion is measured; why people vote the way they do.

## POLS 3222 - Politics, Race, and Cinema

**Credit Hours:** (3) **Description:** Explores the relationships between politics, racial types, and cinematic art using Critical Race Theory as well as Neo-Marxist Thought. American racial politics is discussed through a survey of important cinematic contributions.

## POLS 3302 - West Europe Govt/Politics

**Credit Hours:** (3) **Description:** Comparative study of selected political systems of Western European States. **PREREQUISITE:** POLS 1301.

## POLS 3306 - Latin American Govt/Politics

**Credit Hours:** (3) **Description:** Forms of organization, functions and operations of government in Latin America; emphasis on development of political institutions and present day trends. **PREREQUISITE:** POLS 1301.

## POLS 3309 - Govt/Politics of Mid East \*\*

**Credit Hours:** (3) **Description:** Analysis of organization and functions of governments in area dominated by tenets of Islam; examination of origin and development of Arab-Israeli conflict. **PREREQUISITE:** POLS 1301.

# POLS 3310 - Politics/Developed World

**Credit Hours:** (3) **Description:** Analysis of politics in countries of the developed world; emphasis on historical patterns of state development, structures and institutions; patterns of political participation and policy making.

## POLS 3311 - Global Politics and Sports

**Credit Hours:** (3) **Description:** Examines links between politics and sports with regard to social structures, political cultures, patterns of domination and inequality, relationships of inclusion and exclusion, power asymmetries, political economy, social communication, as well as local, national, ethnic, religious, class and gender identities.

## POLS 3320 - Human Rights/World Politics \*\*

**Credit Hours:** (3) **Description:** History and conceptual underpinnings of modern concept of human rights; human rights in international law; political, economic, and other factors affecting extent to which governments meet their human rights legal obligations; actual human rights practices and conditions in countries; specific challenges of evidence-based human rights research.

## POLS 3325 - Politics/Developing World

**Credit Hours:** (3) **Description:** Exploration of politics of regions and countries typically labeled as "developing"; democratization, corruption, role of military in politics, debt, poverty, conflict, globalization, activities of non-governmental organizations.

# POLS 3330 - Politics/Globalization

**Credit Hours:** (3) **Description:** Analysis of major theories and political implications of globalization; order and disorder in global system; policy-making and governance in globalizing system.

# POLS 3340 - Power/Politics/State

**Credit Hours:** (3) **Description:** Examination of major conceptual traditions in analysis of the state.

## POLS 3401 - Legal/Pol Thght Classical

**Credit Hours:** (3) **Description:** Question of justice and its relation to law and politics; emphasizes confrontation between classical and modern views. **PREREQUISITE:** PHIL 1101, or PHIL 1102, or POLS 1101, or POLS 1102, or permission of instructor.

## POLS 3402 - Legal/Political Thght Modern

**Credit Hours:** (3) **Description:** Question of justice and its relation to law and politics; emphasizes confrontation between early and recent modernity. **PREREQUISITE:** PHIL 1101, or PHIL 1102, or POLS 1101, or POLS 1102, or permission of instructor.

# POLS 3405 - Intro Law/Jurisprudence

**Credit Hours:** (3) **Description:** Sources, functions, and processes of law. **PREREQUISITE:** PHIL 1101 or PHIL 1102, or POLS 1101, or POLS 1102, or permission of instructor.

# POLS 3410 - Contemporary Political Thght \*\*

**Credit Hours:** (3) **Description:** Study of political thought in 20th and 21st centuries.

# POLS 3411 - Critical Race Theory

**Credit Hours:** (3) **Description:** From a political theory perspective, this course provides an in-depth analysis of the relationship between the law and race. This analysis raises fundamental questions about concepts of freedom, justice and equality.

## **POLS 3415 - Feminist Political Theory**

**Credit Hours:** (3) **Description:** Fundamental questions, concepts, schools of thought within contemporary feminist political thought.

## POLS 3420 - Race and Politics in U.S.

**Credit Hours:** (3) **Description:** Examination of the complex and contested politics of race and racism in the United States; topics may include civil rights, integration, immigration law, the criminal justice system, the meaning of Native American sovereignty.

# **POLS 3430 - Conservative Political Thought**

**Credit Hours:** (3) **Description:** This course will examine the history of conservative political thought, with a special emphasis on U.S. conservatism. Potential topics include the complicated relationship of conservatism to capitalism, democracy, populism, and movements for racial and gender equality.

## **POLS 3505 - International Organizations**

**Credit Hours:** (3) **Description:** Theories and concepts of organization of international policy focused on the institutions, both formal and informal, through which much international interaction occurs. **PREREQUISITE:** POLS 1501, or permission of instructor.

## POLS 3506 - American Foreign Policy \*\*

**Credit Hours:** (3) **Description:** Domestic sources, implementation, and content of U.S. foreign policy. **PREREQUISITE:** POLS 1030 or POLS 1501.

## POLS 3507 - Terrorism \*\*

**Credit Hours:** (3) **Description:** Evolution and impact of terrorism on America and the global community; emphasis on the emergence of modern terrorist groups, drivers of terrorist radicalization and recruitment, best practices in countering terrorism, and challenges faced by the liberal democratic state in responding to terrorism.

# POLS 3509 - Contmp Prblm Intl Relation

**Credit Hours:** (3) **Description:** Studies or problems in area of world politics. Repeatable May be repeated for credit once, with change of content. **PREREQUISITE:** POLS 1501, or permission of instructor.

# POLS 3700-3709 - Special Topics in Contemporary Politics

**Credit Hours:** (3) **Description:** Topics of contemporary significance in politics.

## POLS 4101 - Political Statistics \*\*

**Credit Hours:** (3) **Description:** Introduction to analysis of quantitative data, and statistical hypothesis testing in the fields of political science and public and health administration. *Cross listing:* (Same as PADM 4101)

## POLS 4200 - Envrnmntl Law/Policy/Regulatn

**Credit Hours:** (3) **Description:** Survey of the principal federal laws, policies and regulations concerning environmental use and protection.

## POLS 4202 - Constitutional Law: Civil Rights

**Credit Hours:** (3) **Description:** This course will examine the development of constitutional civil rights jurisprudence in the United States. Potential topics include desegregation, affirmative action, and discrimination on the basis of gender, sexual orientation, alienage, wealth, and (dis)ability status.

# POLS 4211 - Const Law/National Powers

**Credit Hours:** (3) **Description:** Relationships and controls of three branches and nature of division of power between nation and states; emphasis on role of Supreme Court as arbiter in constitutional system. **PREREQUISITE:** POLS 1030, or permission of instructor.

# POLS 4212 - Const Law Civil Liberty \*\*

**Credit Hours:** (3) **Description:** Background, role, and legitimate extent of civil rights and liberties in the United States. **PREREQUISITE:** POLS 1030, or permission of instructor. **[G]** 

## POLS 4222 - Urban Politics

**Credit Hours:** (3) **Description:** Roles and processes of politics and governance in urban America in contest of global, social; economic influences on cities and suburbs.

## POLS 4223 - Issues/Urban Politics

**Credit Hours:** (3) **Description:** Selected issues in urban politics and policy.

# POLS 4230 - Legislative Interns

**Credit Hours:** (3-12) **Description:** Supervised internship working with Tennessee General Assembly or other legislative bodies on current legislative programs. Seminar sessions to discuss and analyze problems with which interns are working. Repeatable May be repeated for total of 12 credits. **PREREQUISITE:** permission of department. (S/U)

## POLS 4231 - Admin Internship

**Credit Hours:** (3-12) **Description:** Supervised internship working with administrative branches of national, state, or local governments. Seminar sessions to discuss and analyze problems with which interns are working. Repeatable May be repeated for a maximum of 12 hours credit. **PREREQUISITE:** permission of department *Cross listing:* (Same as PADM 4231)

# POLS 4307 - Govt and Pol Communist China

**Credit Hours:** (3) **Description:** Institutions of government, political process, political elites, political groups and political socialization in Communist China. **PREREQUISITE:** POLS 1301.

## POLS 4315 - Revolution/Political Violence

**Credit Hours:** (3) **Description:** Comparative analysis of forms and causes of political violence within nations; revolutions, ethnic conflict, secessionist movements, terrorism. **PREREQUISITE:** POLS 1301.

# POLS 4316 - Democratic Erosion

**Credit Hours:** (3) **Description:** Causes and consequences of democratic erosion in comparative and historical prespective; populism; propogranda; resistance; focus on US, Latin America, Russia.

# **POLS 4317 - Democratic Transitions**

**Credit Hours:** (3) **Description:** Comparison of transition from authoritarian rule to democracy in Latin America, Asia, Africa, Eastern Europe; consideration of institutional design of democracy and impact of culture on democratic transition and consolidation. **PREREQUISITE:** POLS 1301.

# POLS 4399 - Res & Studies Abroad

**Credit Hours:** (1-6) **Description:** Supervised field research and studies in selected foreign countries. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of the department.

# POLS 4405 - Origin/Dev Amer Pol Thought \*\*

**Credit Hours:** (3) **Description:** Origin and development of political thought in United States from colonial to present time; emphasis on relation between political thought and political institutions and

1312 practices. **PREREQUISITE:** PHIL 1101, or PHIL 1102, or POLS 1101, or POLS 1102, or permission of instructor. **[G]** 

## POLS 4415 - African-Am Pol Thght to 1900

**Credit Hours:** (3) **Description:** Thought of representative African-Americans upon fundamental questions of justice, right, persuasion, power and accommodation prior to the twentieth century. **PREREQUISITE:** POLS 1030, POLS 1101, or POLS 1102.

## POLS 4416 - African-Am Pol Tht from 1900

**Credit Hours:** (3) **Description:** Thought of representative African-Americans upon fundamental questions of justice, right, persuasion, power and accommodation in the twentieth century. **PREREQUISITE:** POLS 1030, POLS 1101, or POLS 1102.

## POLS 4504 - International Law

**Credit Hours:** (3) **Description:** Nature, scope, duties, rights, and evolutionary trends of international law. **PREREQUISITE:** POLS 1501, or permission of instructor.

## POLS 4506 - Prob American Foreign Policy

**Credit Hours:** (3) **Description:** Studies or problems of American foreign policy. Repeatable May be repeated for a maximum 6 credit hours with permission of instructor. **PREREQUISITE:** POLS 1030 or POLS 1501.

## POLS 4508 - Theories Internatl Relations\*\*

**Credit Hours:** (3) **Description:** Theoretical approaches to study of international politics; consideration of various schools of thought, methods, and substantive literatures. **PREREQUISITE:** POLS 1501, or permission of instructor.

# POLS 4510 - Politics of Global Economy \*\*

**Credit Hours:** (3) **Description:** Consideration of manner in which political processes affect and are affected by economic processes at global level. **PREREQUISITE:** POLS 1501, or permission of instructor.

## **POLS 4511 - International Security**

**Credit Hours:** (3) **Description:** Exploration of major issues and topics of international security studies; forms of conflict and diplomacy; proliferations of weapons; insecurity for human beings across the international system.

# POLS 4512 - Global Environmental Politics

**Credit Hours:** (3) **Description:** Exploration of major issues and topics of politics of global environment, including governing the global

environment, multilateral agreements, issues of sustainability, and environmental justice.

# POLS 4513 - Human Security

**Credit Hours:** 3 **Description:** Exploration of major debates and topics of human security studies. Includes examinations of human security in conflict and peace, terrorism and human security, food insecurity, migration and security, and climate change and human security. *Cross listing:* No cross-listing.

## POLS 4709 - Mock Trial

**Credit Hours:** (3-6) **Description:** Experiential learning about the U.S. legal system, jurisprudence, trial court procedure, the work that attorneys do. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

## POLS 4820 - Political History of Israel

**Credit Hours:** (3) **Description:** Interdisciplinary study of political stages in the development of the State of Israel, from mid 19th century to current times, with particular attention paid to key figures in the Zionist movement. *Cross listing:* (Same as JDST 4820)

## POLS 4999 - Senior Thesis

**Credit Hours:** (3) **Description:** Independent research project conducted under direction of faculty supervisor. **PREREQUISITE:** permission of instructor.

## PORT 3301 - Conversation/Culture I

**Credit Hours:** (3) **Description:** Accelerated introduction to Portuguese for students with a command of Spanish. Specific emphasis will be placed on the development of an intermediate oral and written level of proficiency. **PREREQUISITE:** minimum of two 3000-level Spanish courses, or permission of instructor.

## PORT 3311 - Conversation/Culture II

**Credit Hours:** (3) **Description:** Focus on conversation and composition through a series of cultural experiences such as television programs, literary readings, movies, newspaper and magazine articles.

## PORT 4024 - Brazilian Short Story

**Credit Hours:** (3) **Description:** Emphasis on readings of Brazilian contemporary prose and knowledge of Portuguese grammar. **PREREQUISITE:** PORT 3311, or permission of instructor.

## PSYC 1030 - General Psychology\*\*

**Credit Hours:** (3) **Former:** (1200) **Description:** Introduction to psychology as a science of behavior; history of psychology; research strategies; biological bases of behavior; learning; memory; intelligence;

1313 motivation; emotion; personality; psychological disorders; techniques of therapy and applied science. Honors sections are frequently available. **[G]** 

High Impact Practice Code: Service Learning

## PSYC 1300 - Careers in Psychology \*\*

**Credit Hours:** (1) **Description:** Career options within the field; clarification of requirements necessary to achieve post baccalaureate goals. Students will complete a personal plan that specifies long-term goals and how to achieve those goals. Required of all majors.

## PSYC 2130 - Life Span Psychology

Credit Hours: (3) PREREQUISITE: PSYC 1030

## PSYC 3010 - Research and Statistics I \*\*

**Credit Hours:** (4) **Description:** Interpretation, design, and conduct of psychological research and statistical methods used to analyze resulting data with emphasis on non-experimental methods, descriptive statistics and correlational methods. Three lecture hours, one laboratory hour per week. **PREREQUISITE:** PSYC 1030 and a minimum grade of C- in MATH 1420, MATH 1530, MATH 1710, MATH 1830, MATH 1910, or permission of instructor.

## PSYC 3020 - Research and Statistics II \*\*

**Credit Hours:** (4) **Description:** Interpretation, design, and conduct of psychological research and statistical methods used to analyze resulting data with emphasis on experimental methods, inferential statistics and advanced correlational methods. Three lecture hours, one laboratory hour per week. **PREREQUISITE:** PSYC 1030, PSYC 3010.

## **PSYC 3030 - Multicultural Psychology**

**Credit Hours:** (3) **Description:** Comprehensive survey and critical analysis of the multiple ways in which culture determines our thinking and behavior; enhances students' awareness of the countless variations in human behavior across cultures; emphasizes the development of critical thinking, cultural self-awareness, and intersectional theory.

# **PSYC 3101 - Psychology of Personality**

**Credit Hours:** (3) **Description:** Introduction to development and functioning of normal person; variety of representative theoretical orientations examined; emphasis on psychoanalytic theories and other contemporary theoretical viewpoints. **PREREQUISITE:** PSYC 1030.

## **PSYC 3102 - Abnormal Psychology**

**Credit Hours:** (3) **Description:** Basic concepts of psychopathology with emphasis on the development of behavior deviations, description of various neurotic and psychotic reactions, and an introduction to methods of psychotherapy. **PREREQUISITE:** PSYC 1030.

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

# PSYC 3103 - Child Psychology \*\*

**Credit Hours:** (3) **Description:** Patterns of cognitive, interpersonal, and behavioral development from birth through early adolescence; psychological effects of genetic, organic and environmental influences as the child matures. **PREREQUISITE:** PSYC 1030.

## PSYC 3106 - Social Psychology \*\*

**Credit Hours:** (4) **Former:** (3302) **Description:** Survey and analysis of mutual influence of individuals and groups, including topics in social thinking, social influence, and social relations. **PREREQUISITE:** PSYC 1030.

## **PSYC 3108 - Positive Psychology**

**Credit Hours:** (3) **Description:** Focus on strengths and positive experiences as a basis for improving many aspects of daily living including relationships, mental and physical health, education, sports, business, and more. Unlike traditional "self-help" books, this course will approach topics from a basis of sound scienctific research. **PREREQUISITE:** PSYC 1030.

## PSYC 3210 - Abnormal Psychology\*\*

Credit Hours: (3) PREREQUISITE: PSYC 1030

## PSYC 3236 - Psychology of Gender

**Credit Hours:** (3) **Description:** Current research and theory; examination of how gender is understood and represented in our culture and how gender shapes human experience and influences assessment of ourselves and others; postmodern and feminist criticisms of traditional psychological theory and research. **PREREQUISITE:** PSYC 1030.

## PSYC 3303 - Thinking/Cognitive Processes \*\*

**Credit Hours:** (3) **Description:** Overview of fields of cognitive psychology and cognitive science, including perception and attention, short and long-term memory, language, problem solving, reasoning, and decision making. **PREREQUISITE:** PSYC 1030.

# **PSYC 3304 - Perceptual Psychology**

**Credit Hours:** (3) **Description:** Introduction to empirical and theoretical issues in perception; emphasis on classical and contemporary issues and approaches to perception pertaining to how information from environment is transformed, organized, represented and used by the perceiver in adapting to physical world. **PREREQUISITE:** PSYC 1030.

# PSYC 3305 - Psyc Learning/Memory\*\*

**Credit Hours:** (3) **Description:** Survey and analysis of basic processes involved in acquisition and retention of new behaviors and alteration of existing behaviors in animals and humans; examination of central

1314 theoretical concepts and issues in learning. **PREREQUISITE:** PSYC 1030.

## PSYC 3306 - Physiological Psyc\*\*

**Credit Hours:** (3) **Description:** Survey of physiological processes underlying sensation, perception, motivation and emotion, motor systems, unlearned and learned behavior patterns, memory and other psychological functions. **PREREQUISITE:** PSYC 1030.

## PSYC 3307 - Animal Behavior \*\*

**Credit Hours:** (3) **Description:** Synthesis of comparative psychological and ethological approaches to study of animal behavior; behavior genetics, species specific behaviors, behavior as a basis for phyletic classification, and major behavioral dimensions related to phylogenesis. **PREREQUISITE:** PSYC 1030.

## PSYC 3506 - Human Sexuality

**Credit Hours:** (3) **Description:** Survey of existing knowledge of human sexual behavior; physiological, anatomical, psychological and cultural components; normative sexual functioning; such topics as sexual deviation, sexual dysfunctions, and types of treatment are also considered. **PREREQUISITE:** PSYC 1030.

## PSYC 3507 - Alcohol/Drugs/Behavior \*\*

**Credit Hours:** (4) **Description:** Research and analysis in behavioral pharmacology including mechanism of action for major drugs of abuse and their behavioral effects, routes of administrations and factors that govern or affect drug absorption, distribution, metabolism, and excretion. Although not required, some knowledge of biological concepts would be useful. Three lecture hours, one laboratory hour per week. **PREREQUISITE:** PSYC 1030, PSYC 3020.

# PSYC 3508 - Indust/Organizatnl Psyc

**Credit Hours:** (3) **Description:** Application of psychological concepts and methods to phenomena in industrial and organizational settings, with emphasis on personnel selection, classification and evaluation, employee attitudes, morale and motivation, and psychological analysis of the condition of work. **PREREQUISITE:** PSYC 1030.

# PSYC 3509 - Applying Psyc/Community

**Credit Hours:** (3) **Description:** Principles of psychology applied to real-life, community issues; methodologies and techniques, with emphasis upon the behavior analytic approach; descriptions and discussions of actual programs addressing a variety of community issues such as youth violence, traffic safety, and productivity in the workplace.

## PSYC 3510 - Deviance/Role History

**Credit Hours:** (3) **Description:** Introduction to concept of deviance from prehistory to present; emphasis on vilification and glorification of deviant behavior according to time, place and customs. **[G]** 

# PSYC 3512 - Health Psychology \*\*

**Credit Hours:** (4) **Description:** Research and analysis related to the biopsychosocial model of health. Explores psychological influences on health, illness, and responses to those states, as well as the psychological origins and outcomes of health interventions. Three lecture hours, one laboratory hour per week. **PREREQUISITE:** PSYC 1030, PSYC 3020.

# PSYC 3518 - Psychology of Organizational Behavior

**Credit Hours:** 3 **Description:** This class is designed to introduce students to the psychology of organizations and their effect on individuals and groups. Topics include motivation theory, power and authority, communication, teamwork, leadership, job design and organizational structures. Other issues include globalization, cultural diversity, ethics and technology. The prerequisite for this course is PSYC 1030 and although not required it is recommended that you have taken PSYC 3508 for background knowledge. **PREREQUISITE:** PSYC 1030

# PSYC 3520 - Legal/Forensic Psyc

**Credit Hours:** (3) **Description:** Intersection of psychology and law; role of forensic psychologist in criminal investigation, trial procedures, risk assessments, evaluations. **PREREQUISITE:** PSYC 1030.

# PSYC 3530 - Psychology of Language

**Credit Hours:** (3) **Description:** Introduction to field of psycholinguisitics; theories, research and issues in language comprehension and production. **PREREQUISITE:** PSYC 1030.

# PSYC 3601 - Psychology of Evil

**Credit Hours:** (3) **Description:** Concept of "evil" in human social history and the contemporary world. **PREREQUISITE:** PSYC 1030.

# PSYC 3700 - Peer Advising

**Credit Hours:** (3) **Description:** Discussion of theories, research, and practices related to undergraduate development, retention, success; classroom participation as well as research and practical experience. **PREREQUISITE:** permission of department.

# **PSYC 3900 - Practicum in General Psyc**

**Credit Hours:** (3) **Description:** Meet one hour per week plus attend all classes of a section of PSYC 1030 to assist students. Keep office hours to answer questions and grade student work. **PREREQUISITE:** PSYC 1030, and permission of department. S/U

#### 1315 PSYC 4010-4029 - Special Topics in Psychology

**Credit Hours:** (1-3) **Description:** Topics are varied and in online class listings.

# PSYC 4030 - Issues Psychotherapy Rsrch

**Credit Hours:** (3) **Description:** Examination of research evidence pertaining to basic questions about psychotherapy and its effectiveness. Readings include both classic contributions and current research findings. **PREREQUISITE:** PSYC 1030.

# PSYC 4032 - Research Methodology

**Credit Hours:** (3) **Description:** Discussion of advanced topics in methodology. In addition, student completes all phases of a research project, including question formulation, literature review, design, data analysis, and report writing. Research projects evolve from individual student interests. **PREREQUISITE:** PSYC 1030, PSYC 3010, PSYC 3020 or permission of the instructor.

# PSYC 4034 - Children Soc Relationships

**Credit Hours:** (3) **Description:** Examines children's social relationships, particularly peer relationships; social cognitive processing; developmental implications of group status and dyadic friendships; behavioral interactions among peers; impact of reputation on peer group status; gender differences in peer relations; parent management of peer activities; and analyses of conflict and of aggressors and their victims. **PREREQUISITE:** successful completion of a course in child psychology and department permit required.

# PSYC 4040-4049 - Honors Special Topics

**Credit Hours:** (3) **Description:** Topics varied and in online class listings.

# PSYC 4101 - History of Psychology \*\*

**Credit Hours:** (3) **Description:** Comprehensive survey and critical analysis of the history of psychology. Focus on the philosophical and scientific antecedents of contemporary psychology, and the emergence and development of the major professional fields of psychology. The course is especially useful to students seeking career information for graduate studies. **PREREQUISITE:** PSYC 1030 or permission of instructor

# PSYC 4102 - Abnormal Child Psych

**Credit Hours:** (3) **Description:** Survey of various disorders, dysfunctions, and conditions of child psychopathology within the context of a developmental framework. Current and historical conceptualizations of child psychopathology, factors contributing to these problems, and related interventions are examined. **PREREQUISITE:** PSYC 1030.

## PSYC 4305 - Mind/Brain/Intelligence \*\*

**Credit Hours:** (3) **Description:** Interdisciplinary studies of cognition, behavior, emotion, intelligence, and brain mechanisms; synthesis of research contributions from cognitive science, neuroscience, artificial intelligence, and philosophy. **PREREQUISITE:** PSYC 1030. *Cross listing:* (Same as UNIV 4520).

# PSYC 4401 - Intro to Clinical Psychology \*\*

**Credit Hours:** (3) **Description:** Advanced seminar for students considering graduate study in psychology; clinical assessment, diagnosis, and intervention; research in behavioral medicine, forensic, and child clinical psychology. **PREREQUISITE:** PSYC 1030.

## **PSYC 4503 - Special Problems in Psyc**

**Credit Hours:** (1-3) **Description:** Student, under faculty supervision, may read intensively in specialized area, conduct psychological research and/or, obtain field experience in community institutions where psychological principles are applied. NOTE: PSYC 4503 and PSYC 4504 may be repeated for a combined total of 9 hours credit, no more than 6 hours credit with any one faculty member. **PREREQUISITE:** permission of the department. (S/U).

### **PSYC 4504 - Directed Research**

**Credit Hours:** (3) **Description:** Majors receive first hand research experience under tutorship of individual faculty member. Students may work individually or in small groups depending upon project. Projects conform to set of guidelines available from department. NOTE: PSYC 4503 and PSYC 4504 may be repeated for a combined total of up to 9 hours credit, no more than 6 hours credit with any one faculty member. **PREREQUISITE:** permission of instructor. (S/U).

## PSYC 4505 - Special Prob/Behav Neurosci

**Credit Hours:** (3) **Description:** Specialized reading and research conducted under direction of faculty supervisor and with approval of behavioral neuroscience committee. NOTE: PSYC 4505 and PSYC 4506 may be repeated for a combined total of up to 9 hours credit, no more than 6 hours credit with any one faculty member. **PREREQUISITE:** permission of instructor and declaration of Neuroscience concentration.

## PSYC 4506 - Direct Rsch Behav Neuro

**Credit Hours:** (3) **Description:** Specialized reading and research conducted under direction of faculty supervisor and with approval of behavioral neuroscience committee. NOTE: PSYC 4505 and PSYC 4506 may be repeated for a combined total of up to 9 hours credit, no more than 6 hours credit with any one faculty member. **PREREQUISITE:** PSYC 4505 and permission of instructor. (S/U).

## PSYC 4507 - Psyc Internship

1316 **Credit Hours:** (3) **Description:** Supervised field placement in a department approved site. Includes 30 classroom hours and 120 placement hours. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor, completion of 55 or more credit hours, satisfactory completion of PSYC 3010 and PSYC 3020, minimum overall and psychology grade point average of 3.0. (S/U)

### PSYC 4513 - Psychology of Grief/Loss

**Credit Hours:** (3) **Description:** Impact of bereavement from both natural and violent deaths, as well as the loss of children, parents, partners and significant others.

# PSYC 4521 - Practicum in Learning Assistance in Psychology

**Credit Hours:** (3) **Description:** This course is for learning assistants supporting courses in the Department of Psychology. It is designed to prepare students as effective small group facilitators and to train students in the pedagogy implemented in the General Psychology auditorium courses and similar courses. The course includes instruction on written and oral presentation skills, active learning, critical thinking skills, building a community of learning, grading methodology, adaptive quizzing software, and/or student response tools. Repeatable Up to 6 credits **PREREQUISITE:** PSYC 3900

### **PSYC 4994 - Senior Thesis**

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor. For outstanding students who are not participating in Honors Program. (S/U)

## PSYC 4995 - Honors Sr Thesis/Behav Neuro

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor and with approval of behavioral neuroscience committee. **PREREQUISITE:** admission to Honors Program and permission of behavioral neuroscience advisor. (S/U)

## **PSYC 4996 - Honors Senior Thesis**

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor, and with approval of Honors Committee. **PREREQUISITE:** admission to Honors Program, permission of thesis advisor and successful completion of thesis proposal in PSYC 4504. (S/U)

## PSYC 4997 - Senior Thesis/Behav Neurosci

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor and with approval of behavioral neuroscience committee. **PREREQUISITE:** permission of behavioral neuroscience advisor and successful completion of thesis proposal in PSYC 4506.

## PSYC 4998 - Sr Thesis/Cognitive Science

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor and with approval of cognitive science committee. (S/U)

## PSYC 4999 - Honors Sr Thesis/Cognitive Sc

**Credit Hours:** (3) **Description:** Original research conducted under direction of faculty supervisor and with approval of cognitive science committee. **PREREQUISITE:** admission to Honors Program. (S/U)

## PUBH 1180 - Population Health and Society

**Credit Hours:** (3) **Description:** This course offers a broad overview of the study of population health and will introduce students to the major social variables—social class, race, gender, poverty, income distribution, social networks/support, community cohesion, the work and neighborhood environment—that affect population health. The course covers the theoretical underpinnings of each construct (e.g. "race" as a social category), and surveys the research linking each to population health status. The course will also examine population-based approaches to improve the health of the public. No prerequisites. Course will count as a general ed elective.

## PUBH 3101 - Environ Health in the Media

**Credit Hours:** (3) **Description:** Environmental health from the persective of social and mass media.

## PUBH 3102 - Epidemics: The Plague to Ebola

**Credit Hours:** (3) **Description:** Focus on the history of infectious diseases that are of particular public health importance.

# PUBH 3120 - Environmental Health 1: Basics & Method

**Credit Hours:** (3) **Description:** This course serves as an intro to the historic, contemporary, & emerging environmental pollution problems on the local, regional, and global scales, and explores their links to human health. It introduces basic concepts of environmental health, environmental agents, and environmentally-related health outcomes. It teaches methods to study the links between environment and health and health impacts of various environmental processes & exposures. It introduces policies, laws, regulations, and standards relating to environmental & occupational hazards. The course equips students with approaches to assessing & controlling environmental risks & promoting health. Article reviews & case studies will be used

# PUBH 3130 - Introduction to Social Determinants of Health

**Credit Hours:** (3) **Description:** This course introduces students to the social and economic conditions that affect individual and population health. We will explore social influences (e.g., income, race, gender,

education, employment, neighborhood, food security, healthcare, life course) that affect disease prevention and control. We will also examine the role of public health practitioners in working with communities to improve health outcomes. This course is part one of a two-course sequence on social influences on health. The second course will focus on the application of social justice principles in community settings.

# PUBH 3150 - Analytic and Research Methods in Public Health I

**Credit Hours:** (3) **Description:** This course is part one in a two-part course that aims to provide students of public health with the foundation needed to interpret and analyze epidemiological data. The course will focus on introductory biostatistics, as well the history of epidemiology, public health surveillance, measures of disease occurrence and study designs.

# PUBH 3180 - Public Health Principles & Practices

**Credit Hours:** (3) **Description:** This course is part one of a two-course sequence on public health practice. Students will work in teams and will be introduced to real-life public health issues and intervention approaches in an urban setting. Concepts in community organization, planning, and mobilization for the purposes of addressing identified public health concerns will be covered. Teamwork and partnership-building techniques, planning strategies, data collection and analysis approaches, and evidence-based decision-making will be introduced. The second course in this sequence (PUBH 4181) will focus on the application of principles taught in this course within a community setting.

# PUBH 3710 - Public Health Systems & Policy I

**Credit Hours:** (3) **Description:** This undergraduate course is the first section of the two-part series Public Health Systems and Policy. This course covers the history and development of the health care system in the United States. The course will further examine the forces affecting health policy, the impact of policy on health services delivery, and the most recent health care reform efforts. The course will cover the United States public health systems as well. Major topics to be covered include healthcare organization, determinants of health, health care providers, health insurance, public insurance programs, quality improvement programs in health care, changes in health care organizations and health care reform.

## PUBH 4010 - Field work

**Credit Hours:** (2) **Description:** The public health fieldwork experience provides an opportunity for students to work in a community setting in a position that carries responsibility and is of particular interest. Each placement is different, but all depend upon completion of most coursework, the ability to work with minimal supervision, and acquiring permission of the student's advisor and onsite preceptor/supervisor. The Council on Education for Public Health (CEPH) requires that each BSPH student be able to demonstrate the application of these concepts through an internship or fieldwork experience that is relevant to public health.

## PUBH 4101 - Healthcare in America

**Credit Hours:** (3) **Description:** Introduces students to the complexity of the US health care system, including historical developtment, organization in the US, forces effecting health policy, delivery, reform efforts. Designed for student contemplating entering health profession.

# PUBH 4121 - Environmental Health II: Practice and Application

**Credit Hours:** (3) **Description:** This course introduces specific substances & hazards in the natural and built environment that affect human health. The course is comprised of a broad range of topics viewed through an environmental justice lens. Topics include air pollution, water quality, solid waste management, food safety, built environment, healthy homes, environmental disasters, & occupational health. Discussions include the role of state, local, & federal agencies in protecting public health, roles of community groups, & venues and approaches to communicating with the public. Students will develop an understanding of the scope, depth, & magnitude of current environmental problems & challenges to ensuring env justice. **PREREQUISITE:** PUBH 3120

## PUBH 4131 - Social Justice & Public Health

**Credit Hours:** (3) **Description:** This course introduces students to the concept of social justice as a public health construct. We will explore barriers to disease prevention opportunities, health care, and other impactors of health that are not equally distributed. We will examine methods for creating equal opportunities that improve population health. We also will examine the role of public health practitioners in implementing social justice principles in order to improve health outcomes. This course is part two of a two-course sequence on social influences on health. The first course (PUBH 3130) introduced students to concepts related to social determinants of health (the social and economic conditions that affect individual and population health). **PREREQUISITE:** PUBH 3130

# PUBH 4151 - Analytic and Research Methods in Public Health II

**Credit Hours:** (3) **Description:** This course builds on the foundations built in Analytic and Research Methods in Public Health I and provides additional skills to analyze and interpret epidemiological data. The course will focus on intermediate biostatistics, as well as bias, confounding, design issues and critically evaluating epidemiologic studies. **PREREQUISITE:** PUBH 3150

# PUBH 4181 - Public Health Principles & Practices II

**Credit Hours:** (3) **Description:** This course is part two of a two-course sequence on planning, implementing, & evaluating public health interventions. The focus of this course will be on the application of

principles taught in PUBH 3/4180 in community settings. The goal of the course is to facilitate the work of student teams with a community agency to develop a program plan for the agency that includes: 1) an assessment of needs and assets, 2) a theory-based program plan to meet the needs and capitalize on the assets including the collaboration of other key community partners, 3) an implementation plan with budget outline, and 4) a process and outcome evaluation plan. **PREREQUISITE:** PUBH 3180

## PUBH 4707 - InternI Health Problems/Issue

Credit Hours: (3)

## PUBH 4711 - Public Health Systems & Policy II

**Credit Hours:** (3) **Description:** This undergraduate course is the second section of the two-part series Public Health Systems and Policy. This course will introduce the health policy making process in the United States. It presents different frameworks to understand the social, political, economic dimensions of health care policy making in the United States. Major topics to be covered include role of government in health policy making, law and the legal system, health insurance, health economics in health policy context, government health insurance programs, and health policy analysis. **PREREQUISITE:** PUBH 3710

# PUBH 4985 - Capstone Experience

**Credit Hours:** (3) **Description:** This is the final requirement in the public health core curriculum and involves the synthesis and application of BS public health program content and competencies in a practice setting with emphasis on student identified areas for professional growth. This course is required for all public health majors enrolled in the BS degree program. It is restricted to senior level standing and requires the completion of most major core coursework. Students may opt to enroll in the course in either the fall or spring semester of their senior year only with approval from their academic advisor.

## PADM 3501 - Civic Engagement, Voluntarism

**Credit Hours:** (3) **Description:** Critical introduction to voluntary action and civic engagement in U. S. society; exploration of concepts such as democracy, community, leadership, and civil society. This course is intended for all students interested in voluntarism, community serivce, and public participation.

## PADM 3601 - Public Admin\*\*

**Credit Hours:** (3) **Description:** Concepts, practices and trends of governmental administration in executive departments and national, state, and local public agencies; analysis of bureaucracy, public budgeting and finance; public personnel, public service administrative leadership. **PREREQUISITE:** ENGL 1020 or equivalent; junior or senior standing.

# **PADM 4101 - Political Statistics**

**Credit Hours:** (3) **Description:** Introduction to analysis of quantitative data; statistical hypothesis testing in fields of political science and public and health administration. **PREREQUISITE:** POLS 3100. *Cross listing:* (Same as POLS 4101)

## PADM 4207 - Health Politics/Policy

**Credit Hours:** (3) **Description:** Introduction to the political, economic, and social forces affecting the health care system in the United States; emphasis on the development and comparison of health policies within the context of the stages of American policy making.

## PADM 4221 - Issues/Urban Admin

**Credit Hours:** (3) **Description:** Politics, administration, and public policy in urban context; administrative aspects of selected governmental policy making processes; interrelationships of governments at various levels; urban challenges facing modern public administrators.

## PADM 4225 - Application/Urban Admin

**Credit Hours:** (3) **Description:** Tools and strategies of public and nonprofit administration to accomplish collective purposes, develop communities, enhance civic capacity toward improved quality of life in urban settings.

## PADM 4226 - Intro Nonprofit Organizations

**Credit Hours:** (3) **Description:** Critical understanding of historical development and impact of public sector, dynamic environment of nonprofit organization and current issues of importance to nonprofit decision makers. **PREREQUISITE:** ENGL 1020 or equivalent; junior or senior standing.

## PADM 4227 - Issues/Nonprofit Admin

**Credit Hours:** (3) **Description:** Unique aspects of using financial information in nonprofit administration; principles and practices of nonprofit managerial and financial accounting; nonprofit budget and control issues; analysis of nonprofit financial statements. **PREREQUISITE:** PADM 4226.

## PADM 4228 - Grant Development/Management

**Credit Hours:** (3) **Description:** Elements of grant writing process; skills to seek, solicit, and receive grant awards from foundation and government sources; administration of awards to meet goals of recipient and granting agency.

## PADM 4231 - Admin Internship

**Credit Hours:** (3-12) **Description:** Supervised internship working with administrative branches of national, state, or local governments. Seminar sessions to discuss and analyze problems with which interns are working. Repeatable May be repeated for a maximum of 12 hours

1319 credits. **PREREQUISITE:** permission of division. *Cross listing:* (Same as POLS 4231)

## PADM 4401 - Comparative Public Adm\*\*

**Credit Hours:** (3) **Description:** Examination of differing concepts and perspectives of public administration; variability in administrative systems, political power and control over public bureaucracies, education and recruitment of public bureaucrats; bureaucratic concept of public interest and responsiveness to the public.

## PADM 4412 - Neighborhood Dev/Social Entrep

**Credit Hours:** (3) **Description:** Role of various institutions and their relationship to developmental needs of inner city neighborhoods; evolution of American cities as context for understanding urban neighborhoods and poverty; role of government and foundations in shaping policy at local level; rise of neighborhood associations and non-profits as extensions of family values; contributing to better understanding of neighborhoods and various intervention strategies. *Cross listing:* (Same as ANTH 4412)

## PBRL 3400 - Intro to Public Relations

**Credit Hours:** (3) **Description:** Development, scope, and modern role of public relations in society. Emphasis on the four stages of the public relations process: research, action, communication, and evaluation. Understanding of unique aspects of public relations in government, nonprofit, entertainment, and others.

## **PBRL 3409 - Public Relations Case Studies**

**Credit Hours:** (3) **Former:** JOUR 3409 **Description:** Case studies and typical public relations problems; planning and preparation of communications materials for various media; application of public relations techniques. **PREREQUISITE:** PBRL 3400

## PBRL 3421 - Public Relations Writing \*\*

**Credit Hours:** (3) **Description:** Emphasis on communication tactics; plan, write, and produce public relations tools; audience and media selection; print and electronic media and new media. Two lectures hours, two laboratory hours per week. Fee \$35 per credit hour **PREREQUISITE:** JRSM 2121, PBRL 3400.

## PBRL 3431 - Advanced PR Writing

**Credit Hours:** (3) **Description:** Emphasis on the strategic aspects of public relations writing and further development of writing skills for a wide variety of public relations vehicles including preparation of more complex materials such as speeches, feature stories, white papers, videos, and materials for special events and crises. Fee \$35 per credit hour **PREREQUISITE:** PBRL 3421

# PBRL 3441 - Writing for Social Media

**Credit Hours:** (3) **Description:** Development of strategic writing skills to write effectively across various social media platforms with an emphasis on the need to tailor the message to both the audience and the platform through which it is communicated. Topics explored will include style, repurposing of content, specific requirements for various platforms, organizational voice, SEO and strategic message development. Fee \$35 per credit hour **PREREQUISITE:** PBRL 3421

# PBRL 4301 - Event Planning for PR

**Credit Hours:** (3) **Description:** Development, execution and evaluation of events that support strategic communication goals. Special attention will be given to the needs of the public relations industry. Hands on experience will be integrated into the curriculum **PREREQUISITE:** Students must have completed 60 hours of coursework.

# PBRL 4410 - Public Relations Research

**Credit Hours:** (3) **Description:** Identifying, characterizing and evaluating stakeholder groups and alternative channels of communication; formal research procedures include sampling, instrument design, information gathering, data processing, analysis and reporting. **PREREQUISITE:** PBRL 3400 and PBRL 3421.

# PBRL 4421 - Crisis Comm in Public Relation

**Credit Hours:** (3) **Description:** Explores theories and research related to issues management and public relations communication before, during and after a crisis; examines the fundamentals of organizational communication, crisis management and strategic planning. Emphasis is placed on practical application of crisis communications theory with use of real-life case studies. **PREREQUISITE:** PBRL 3400.

# PBRL 4430 - Media Relations

**Credit Hours:** (3) **Description:** Development of media relations skills, including advanced writing of collateral materials, presentations, pitching and media training. Hands-on experience will be integrated into the curriculum to include conducting press conferences, media interviews and media training. Industry standard strategic tools and techniques for successful media relationships will be explored. Fee \$35 per credit hour **PREREQUISITE:** PBRL 3421, Permit and 60 hours

# PBRL 4431 - Music Promo/Public Relations

**Credit Hours:** (3) **Description:** Examines publicity and promotion of artists and events within the music industry. Focuses on music journalism, advanced writing of collateral material, and planning and working special events for artists in various capacities. **PREREQUISITE:** students must have successfully completed 75 credit hours.

# PBRL 4440 - Public Relations Campaigns \*\*

**Credit Hours:** (3) **Description:** Application of theory, research data, and problem-solving techniques in the development of comprehensive

1320 public relations strategies. **PREREQUISITE:** PBRL 4410; JRSM 3950 or JRSM 3900.

# PBRL 4450 - Social Media Tactics/Analytics

**Credit Hours:** (3) **Description:** Explores the role of social media in public relations and related fields. Through hands-on experience, develops skills and abilities for social media management including social media strategy, account management, content creation and curation, and evaluation of social media campaigns using platform & other industry-standard analytics tools. Fee \$35 per credit hour **PREREQUISITE:** JRSM 3905, PBRL 3441

# PBRL 4800-4809 - Special Topics in Public Relations

**Credit Hours:** (1-3) **Description:** Topics vary by semester, see online class schedule listing.

# PBRL 4830 - Directed Indiv Study

**Credit Hours:** (1-3) **Description:** Independent study and reseach, or practicum, or project under supervision. Repeatable May be repeated for a maximum of 3 hours credit **PREREQUISITE:** Permission of the instructor.

# RLGN 1100 - Introduction to Religion \*\*

**Credit Hours:** (3) **Description:** Introduction to the world's major spiritual traditions from ancient times to the present. **[G]** 

# **RLGN 3001 - Exploring Christian History**

**Credit Hours:** (3) **Description:** Exploration of the history and development of Christianity.

# **RLGN 3002 - Studies In Islam and Its Cultures**

**Credit Hours:** (3) **Description:** This course provides an introduction to the religion of Islam. Students will explore the various ethnic, theological, and cultural diversity in Islam. The course will cover an introductory history of Islam in America and evidence of early Muslims in the U.S. **PREREQUISITE:** None

# **RLGN 3100 - Perspectives on Religion**

**Credit Hours:** (3) **Description:** Continued study of religion using a range of comparative and theoretical perspectives; exploration of perennial themes in religion, drawing on the different traditions as examples. **PREREQUISITE:** RLGN 1100.

# RLGN 3101-3105 - Special Topics in Religious Studies

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated for a maximum of 6 hours credit.

## **RLGN 4010 - Directed Readings**

**Credit Hours:** (3) **Description:** Reading on particular topic in religious studies under the supervision of faculty member. **PREREQUISITE:** permission of program coordinator.

# RLGN 4050-4075 - Special Topics in Religious Studies

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings. Repeatable May be repeated for a maximum of 6 hours credit.

# **RLGN 4990 - Capstone Project**

**Credit Hours:** (3) **Description:** Continues study of religion requiring individual investigation of specific topic in religious studies leading to completion of significant research paper. **PREREQUISITE:** RLGN 3100 and permission of instructor.

# **RUSS 1010 - Elementary Russian I**

**Credit Hours:** (3) **Description:** Introductory survey of Russian grammar and phonetics.

# **RUSS 1020 - Elementary Russian II**

**Credit Hours:** (3) **Description:** Continuation of RUSS 1010. **PREREQUISITE:** RUSS 1010, or permission of instructor.

## **RUSS 2010 - Intermediate Russian I**

**Credit Hours:** (3) **Description:** Comprehensive review of Russian grammar, exercises in spoken and written Russian. **PREREQUISITE:** RUSS 1020, or permission of instructor.

## **RUSS 2020 - Intermediate Russian II**

**Credit Hours:** (3) **Description:** Continuation of RUSS 2010. **PREREQUISITE:** RUSS 2010, or permission of instructor.

## **RUSS 3301 - Conversation and Composition**

**Credit Hours:** (3) **Description:** Development of advanced oral and written communication skills. **PREREQUISITE:** RUSS 2202 or permission of instructor.

# **RUSS 3302 - Conversation and Composition**

**Credit Hours:** (3) **Description:** Continuation of RUSS 3301. **PREREQUISITE:** RUSS 3301, or permission of instructor.

## RUSS 4780 - Individual Study Russian

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of Russian chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit by permission of department chair. **PREREQUISITE:** permission of instructor.

## RUSS 4791-4799 - Special Topics in Russian

**Credit Hours:** (3) Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# MUSA 4260-4269 - Special Topics in Sacred Music

**Credit Hours:** (1-3) **Description:** Topics are varied and announced in the online class listings.

## SWRK 2010 - Introduction to Social Work\*\*

**Credit Hours:** (3) **Former:** (2910) **Description:** Overview of social work as profession, including introduction to its value base, knowledge base, and skill base; and roles of social workers in social service agencies. Volunteer experience required. Two and one-half lecture hours, one and one-half laboratory hours per week. Fall, Spring

# SWRK 2011 - Writing for Social Work

**Credit Hours:** (3) **Description:** Overview of the writing and documentation methods used by social workers; emphasizes the process of critical thinking and the development of effective writing skills required for generalist social work practice.

# SWRK 2911 - Soc Response to Human Need

**Credit Hours:** (3) **Description:** Introduction to historical and contemporary issues related to American social welfare systems; analysis of impact on vulnerable populations, value implications, change processes, and culturally relevant concepts of need.

#### SWRK 3902 - Human Behavior/Soc Envrnmnt

**Credit Hours:** (3) **Description:** Overview of human development from birth through old age; focus on interaction of biological, psychological, and socio-cultural factors; major developmental theories, transitional phases, and variant lifestyles; relevance to social functioning and social work practice. Fall, Spring **PREREQUISITE:** SWRK 2010 or SWRK 2911 and BIOL 1010/BIOL 1011, or permission of the undergraduate program coodinator.

# SWRK 3903 - Social Work Practice I

**Credit Hours:** (4) **Description:** Overview of traditional social casework methodology; emphasis on theoretical approaches and generalist practice; beginning applications of case study model.

**PREREQUISITE:** SWRK 2010 SWRK 2911, SWRK 3902, or permission of director.

High Impact Practice Code: Research

## SWRK 3904 - Social Work Practice II

**Credit Hours:** (3) **Description:** Continuation of SWRK 3903, with emphasis on application of theory through assessment, intervention planning, use of community resources, and functions of social workers; extensive case analysis. **PREREQUISITE:** SWRK 2010, SWRK 2911, SWRK 3902 SWRK 3903.

High Impact Practice Code: Internship

# SWRK 3906 - Social Work Practice III

**Credit Hours:** (3) **Description:** Theory and application of community organization concepts as applied to community structures and functions, roles of social worker in these settings. **PREREQUISITE:** SWRK 2010, SWRK 2911, SWRK 3902, SWRK 3903.

## SWRK 3920 - Soc Welfare Policy/Programs

**Credit Hours:** (3) **Description:** Overview of social welfare policy development and methods; programs resulting from these efforts; influence of competing value orientations; exposure to differing models of policy analysis; and implications for professional practice including the role of social work in developing, implementing, and evaluating social programs. **PREREQUISITE:** SWRK 2010 and SWRK 2911.

## SWRK 3930 - Intro Soc Work Research

**Credit Hours:** (3) **Description:** History and methods of social work research including scientific thinking, application of statistical operations, and systematic approaches to acquisition of social work knowledge. **PREREQUISITE:** SWRK 2010 and SWRK 2911. **COREQUISITE:** SOCI 3311.

# SWRK 4060 - Social Work Integrated Health

**Credit Hours:** (3) **Former:** SWRK 4060/6060 **Description:** Social Work Practice in Integrated Health Care is an elective course for seniors and master's of social work students. The objective of the course is to introduce social work students to the direct practice of integrated behavioral health in primary care. Students will become knowledgeable of the roles of behavioral health providers working in primary care settings, theories and models of care, and cross-cultural issues. They will develop skills in engagement, assessment, intervention planning and implementation, and practice evaluation. **PREREQUISITE:** Senior status and approval of the instructor.

## SWRK 4061 - Substance Abuse Treatment

**Credit Hours:** (3) **Description:** Prepare students for evidence-based practice in the field of substance abuse treatment. The course will present an integrative biopsychosocial model for the understanding and

treatment of substance abuse. Overview of the history of substance abuse, a review of models of addiction, a multidimensional model of the addiction process, the physiological effects of commonly abused substances, assessment and diagnosis of substance abuse disorders, and specific, evidence-based interventions adolescent and adult clients. **PREREQUISITE:** Approval of instructor.

## SWRK 4830 - Field Instruction Soc Work I

Credit Hours: (3) Description: Supervised internship in social service agency or program. Minimum two days per week required. **PREREQUISITE:** SWRK 3904, SWRK 3906. COREQUISITE: SWRK 4840.

High Impact Practice Code: Service Learning

# SWRK 4831 - Field Instruction Soc Work II

**Credit Hours:** (4) **Description:** Continuation of supervised internship. Minimum three days per week required. **PREREQUISITE:** SWRK 4830 and SWRK 4840. **COREQUISITE:** SWRK 4841.

High Impact Practice Code: Internship

## SWRK 4833 - Religion/Spiritly SWRK Prac

**Credit Hours:** (3) **Description:** Importance of religion and spirituality in shaping belief systems; psychosocial development; development of social policy; significance of religious institutions in providing social services; examines how religion and spirituality influence the individual, family, community.

## SWRK 4840 - Integrative Field Seminar I

**Credit Hours:** (2) **Description:** Integration of social work theory with field instruction experiences. **PREREQUISITE:** SWRK 3906. **COREQUISITE:** SWRK 4830.

High Impact Practice Code: Internship

## SWRK 4841 - Integrative Field Seminar II

**Credit Hours:** (2) **Description:** Continuation of SWRK 4840. **COREQUISITE:** SWRK 4831.

High Impact Practice Code: Internship

## SWRK 4911-4919 - Special Topics in Social Work

**Credit Hours:** (3) **Description:** Topics of contemporary interest in social work profession and in social welfare practices. **PREREQUISITE:** SWRK 2911, or permission of instructor.

## SWRK 4933 - Directed Ind Study

**Credit Hours:** (1-4) **Description:** Directed advanced reading, field study and/or research in special areas of social work, not otherwise provided in curriculum. NOTE: no more than 4 hours may be taken in any one semester. May be repeated for maximum of 6 hours credit. **PREREQUISITE:** Social Work major and permission of undergraduate program coordinator, Department of Social Work.

# SWRK 4934 - Child Welfare Policy/Services

**Credit Hours:** (3) **Description:** Historic overview and contemporary application of child welfare policy; problems in policy development; contemporary American child welfare services in both public and private domains. **PREREQUISITE:** SWRK 2010, SWRK 2911. **COREQUISITE:** SWRK 3920.

# SWRK 4935 - Child Welfare II

**Credit Hours:** (3) **Description:** Roles and responsibilities of social workers practicing within child welfare system; mastery of practice skills at a range of levels, such as individual, family, and environment designed to develop culturally competent child welfare workers. **PREREQUISITE:** SWRK 2010, SWRK 2911. **COREQUISITE:** SWRK 3903.

## SWRK 4937 - School Social Work

**Credit Hours:** (3) **Description:** Overview of school social work including public education system from the national, state, and local levels; examination of range of practice and policy issues related to delivery of social work services in school settings. Special emphasis on understanding current federal and state laws as they relate to practice with school-age children and their families. **PREREQUISITE:** SWRK 2010, SWRK 2911, and SWRK 3920.

# SWRK 4939 - Mental Health Concepts

**Credit Hours:** (3) **Description:** Definition, assessment, and classification of mental disorders, psychopathology, and basic psychotherapeutic and psychopharmacological treatment approaches; dangers of diagnosing in terms of labeling, stereotyping, and stigmatizing; impact of social and economic injustice on the mentally ill. **PREREQUISITE:** SWRK 2010, SWRK 2911, and SWRK 3902.

## SWRK 4940 - Grief and Loss

**Credit Hours:** (3) **Description:** Normal and unresolved grief and loss as well as therapeutic intervention; values and ethics, cultural diversity and populations at risk as they relate to grief and loss. **PREREQUISITE:** SWRK 2010, SWRK 2911 and SWRK 3902.

# SWRK 4944 - Encountering Poverty

**Credit Hours:** (3) **Description:** This 4000/6000 level elective course allows students to understand poverty concepts and theories, and to explore poverty in rural areas and urban centers from the global level to the local level. Students are exposed to the realities of poverty and examine the role of power in shaping the social, economic, and military

1323 policies that result in poverty and social exclusion. The strengths and weaknesses of various approaches to policy development and analysis are explored. Repeatable This course may not be repeated. *Cross listing:* SWRK 6944

### SWRK 4945 - Social Work in Paris

**Credit Hours:** (6) **Description:** This 4000/6000 level elective studyabroad course will allow students to learn about the French social welfare system, the profession of Social Work, social work service delivery, and French culture and contextualizing factors through a onemonth immersion course in Paris, France, delivered in partnership with L'Ecole Pratique de Service Social. Students will compare and contrast the French and American social welfare systems and develop projects for social change. This course may not be repeated. Fee Study-Abroad: \$3,500 *Cross listing:* SWRK 6945.

## SOCI 1010 - Introduction to Sociology \*\*

**Credit Hours:** (3) **Description:** (1111). Introduction to concepts, methods and theoretical perspectives in sociology. Basic principles of sociological reasoning introduced through lectures and reading assignments. **[G]** 

High Impact Practice Code: Service Learning, Research

# SOCI 2100 - Sociology of Globalization

**Credit Hours:** (3) **Description:** Sociological analysis of forces and consequences of globalization; economic globalization, global inequality, transnational governance and democracy, transnational civil society, global cultural change, and global-local linkages. [G]

# SOCI 3112 - Contemporary Social Problems \*\*

**Credit Hours:** (3) **Description:** Sociological approaches to understanding contemporary social problems; magnitude, causes, consequences, and possible solutions to various problems such as poverty, racism, sexism, problems of aging, crime, and population.

# SOCI 3311 - Social Statistics \*\*

**Credit Hours:** (3) **Description:** Application of basic statistical concepts and techniques to social analysis; description of data for single variables and for relationships between two variables; tests of significance for relationships between two variables involving sample data; use of packaged statistical computer programs for single- and two-variable analysis.

## SOCI 3322 - Methods of Social Research \*\*

**Credit Hours:** (3) **Description:** Overview of process of social research; selection and formulation of problem, design of research, methods of investigation, analysis and interpretation of data, and report preparation; emphasis on data collection techniques.

## SOCI 3401 - Social Inequality \*\*

**Credit Hours:** (3) **Description:** Unequal distribution of power, property, and prestige and social relations of dominance and subordination in the American class system; how and why this inequality develops and persists; differences in life chances and options across different social classes.

## SOCI 3420 - Sociology of the South

**Credit Hours:** (3) **Description:** Political economy and major institutions in the South and implications for different races and classes; the South since World War II, including the Civil Rights movement.

## SOCI 3422 - Racial/Ethnc Minorities \*\*

**Credit Hours:** (3) **Description:** Comparative study of racial and ethnic minorities in United States, how inequality is institutionalized in such areas as employment, education, political participation, and social relations; emphasis on how subordinate groups resist oppression and initiate social change. [G]

## SOCI 3432 - Sociology of Gender \*\*

**Credit Hours:** (3) **Description:** Traditional conceptions of masculinity and femininity and modifications of these resulting from economic, demographic and cultural changes; socialization for masculine and feminine roles and variations in these roles throughout life cycle; class, race, occupational and other institutional differences in sex roles.

## SOCI 3501 - Sociology of Deviant Behavior \*\*

**Credit Hours:** (3) **Description:** Problems in applying definitions of deviance in everyday life; theories about causes and consequences of deviance critically reviewed; types of deviance analyzed, ranging from interpersonal violence to various forms of sexual expression.

# SOCI 3541 - Criminology

**Credit Hours:** (3) **Description:** Nature and significance of criminality; etiology of illegal behavior; trends in social reactions to crime and criminals; evolution of biological, psychological, and sociological theories of criminal behavior.

## SOCI 3701 - Individual and Society \*\*

**Credit Hours:** (3) **Description:** Basic theory and research dealing with study of human behavior in social situations; emphasis on communication processes, socialization, social roles, social self, and interaction in group contexts.

# SOCI 3820 - Sociology of Education

1324 **Credit Hours:** (3) **Description:** Sociological analysis of education and its functions, school and community relationships; problems of social change and educational adjustments.

## SOCI 3831 - Sociology of the Family\*\*

**Credit Hours:** (3) **Description:** American family patterns, including mate selection, man-woman relationships, marital satisfaction, parent-child communication, divorce, alternative lifestyles and other contemporary issues.

## SOCI 3860 - Sociology of Religion\*\*

**Credit Hours:** (3) **Description:** Role of religion in modern society; relationship between religion and other spheres of life; sociological examination of cults, sects, churches, and religious movements; causes and consequences of religious beliefs and practices.

## SOCI 3940 - Social Change

**Credit Hours:** (3) **Description:** A critical assessment of explanations and patterns of social change from a global perspective; emphasis on social institutions, social movements/revolutions, democratization, culture, technology, population dynamics, and environmental transformation.

## SOCI 4210 - Rise of Sociological Theory

**Credit Hours:** (3) **Description:** Nature, grounds, and explanatory powers of various forms of sociological theory; analysis of bases for scientific and philosophical assumptions and social and political contexts; major theorists including Durkheim, Marx, Weber, Simmel.

## SOCI 4211 - Contemp Sociological Theory \*\*

**Credit Hours:** (3) **Description:** Trends and developments in sociological theory from the mid-20th century to the present; descriptive to explanatory to critical theories of social action, organization, inequality, and change, as well as interaction between people, groups, and societies.

## SOCI 4312 - Intermediate Social Stat

**Credit Hours:** (3) **Description:** Multivariate analysis of social data; use of computer programs for data management and statistical analysis. **PREREQUISITE:** SOCI 3311, SOCI 3322, or equivalent, or permission of the instructor.

# SOCI 4413 - Global Info Tech & Soc of Work

**Credit Hours:** (3) **Description:** Sociological perspectives for understanding the complex interactions of technology and society, the embeddedness of digital technologies in diverse social structures, the social consequences of technological changes and the technology-driven opportunities for and challenges to work in an era of globalization.

## SOCI 4420 - Racial Inequality

**Credit Hours:** (3) **Description:** Relations of dominance and subordination in the United States; social and political experiences of African Americans, Asian Americans, and Latinos, especially strategies employed to resist oppression and reduce inequality.

## SOCI 4425 - Environmental Sociology

**Credit Hours:** (3) **Description:** Role of social institutions, power, and inequality in shaping environmental discourse and action; dynamics of environmental social movements.

## SOCI 4442 - Sociology of Poverty

**Credit Hours:** (3) **Description:** Structural sources of inequality and how experiences of poverty are shaped by race, gender and age.

## SOCI 4460 - Black/White Women in South

**Credit Hours:** (3) **Description:** How history of South and politicaleconomic structure has shaped black and white women's work, family, community activities, and relationships; emphasis on collaboration and competition aspects, identity issues, and demographic characteristics; focus on the Memphis area.

## SOCI 4541 - Sociology of Aging

**Credit Hours:** (3) **Description:** Ageism in sociocultural contexts; current beliefs, values, and norms regarding aging; structural location of aging in society; and implications of ageism in employment, poverty, private and institutional housing, crime, physical illness and mental illness.

# SOCI 4631 - Cities in Change

**Credit Hours:** (3) **Description:** Historical transformation of urban communities and urban life; impact of globalization on local places; class, race and ethnic segregation in urban and metropolitan communities; immigration; urban political, economic and social change in comparative perspective.

## SOCI 4641 - Sociology/Global Environment

**Credit Hours:** (3) **Description:** Examination of interactions between physical environment in which we live and human societies which we have created; emphasis on crises of global environment and efforts toward sustainable development.

# SOCI 4703 - Social Psychology of Sports

**Credit Hours:** (3) **Description:** This course focuses on the social psychology of sport. The social psychology of sport investigates identities, emotions, and interactions in sports. We will look both at the social psychology of sport which examines sports as a social

phenomena and social psychology through sport which uses sport to understand social psychological theories.

# SOCI 4842 - Sociology/Occup/Professions

**Credit Hours:** (3) **Description:** Sociological analysis of division of labor, occupational groupings, career patterns, and professional associations in modern American society; meaning of work.

# SOCI 4851 - Medical Sociology

**Credit Hours:** (3) **Description:** Explanation of the relationships among society, population processes and health; examination of the ways in which health is as much social as biological.

# SOCI 4852 - Sociology of Mental Illness

**Credit Hours:** (3) **Description:** Definition, taxonomy, models; epidemiology, demographics of class, age, sex, race, residence, marital status; media images, public policy, delivery systems, examines personal experiences and social stigma; explores expression of emotions, assertiveness training, anger management, suicide, codependency, divorce recovery, alcoholic family roles; surveys sociotherapeutic responses; social stress.

## SOCI 4912 - Directed Indiv Study

**Credit Hours:** (1) **Description:** Individually directed advanced reading and/or research in special areas of interest. May be repeated for maximum of 6 hours credit. **PREREQUISITE:** PREREQUISITE: permission of department chair.

# SOCI 4995 - Senior Capstone Seminar\*\*

**Credit Hours:** (3) **Description:** Integration of perspectives, theories, methods, and substantive foci of undergraduate courses; evaluation of sociological evidence and development of logical arguments. Analysis of sociology as a discipline and a discussion of careers in sociology. Specific substantive focus of the seminar may vary. **PREREQUISITE:** SOCI 3311, SOCI 3322, SOCI 4210 OR SOCI 4211, and nine additional upper division hours in SOCI.

## SOCI 4996 - Public Sociology Seminar

**Credit Hours:** (3) **Description:** Engagement of multiple publics in multiple ways to address critical community and civil society issues; creation of multimedia projects to promote awareness and advocacy, and to assess opportunities for social change.

# SOCI 4997 - Internship in Sociology

**Credit Hours:** (3) **Description:** Supervised practical experience in applying sociological principles in a setting appropriate to the discipline of sociology. Students select topic and setting in consultation with the Internship Coordinator. **PREREQUISITE:** PREREQUISITE: permission of instructor.

## **SOCI 4998 - Honors Thesis**

**Credit Hours:** (3) **Description:** Original research conducted under the direction of a faculty mentor. May be repeated in successive semesters for a maximum of 6 hours credit. May be taken by honors students in addition to or instead of SOCI 4999. **PREREQUISITE:** PREREQUISITE: admission to the Honors Program in Sociology.

## SOCI 4999 - Senior Thesis Seminar\*\*

**Credit Hours:** (3) **Description:** Analysis of process and practice of sociological inquiry; emphasis on integration of sociological theory, research methods, statistics, and knowledge of a substantive area through formulation and completion of original research project. Research problem will be formulated and executed by student with consultation and supervision of instructor. **PREREQUISITE:** SOCI 3311, SOCI 3322, SOCI 4210 or SOCI 4211, and nine additional upper division hours in SOCI.

## SPAN 1010 - Elementary Spanish I \*\*

**Credit Hours:** (3) **Description:** Basic skills fundamental to language proficiency and culture.

## SPAN 1020 - Elementary Spanish II\*\*

**Credit Hours:** (3) **Description:** Further development of basic skills fundamental to language proficiency and culture. **PREREQUISITE:** SPAN 1010, or equivalent.

## SPAN 2010 - Intermediate Spanish I\*\*

**Credit Hours:** (3) **Description:** Comprehensive review of Spanish grammar, exercises in writing conversation, and readings in Hispanic literature and culture. **PREREQUISITE:** SPAN 1020, or equivalent.

## SPAN 2020 - Intermediate Spanish II\*\*

**Credit Hours:** (3) **Description:** More advanced readings. **PREREQUISITE:** SPAN 2010, or equivalent.

## SPAN 3000 - Spanish Integrated Skills

**Credit Hours:** (3) **Description:** Designed to help students improved their skills in order to successfully complete a concentration or minor in Spanish. This course will not count toward fulfilling the requirements for the concentration or minor in Spanish, and is not a prerequisite for taking any upper-division Spanish courses.

## SPAN 3301 - Conversation

**Credit Hours:** (3) **Description:** Designed to help students develop oral proficiency; diverse opportunities for self-expression. Not intended for students with native or near-native proficiency in Spanish. **PREREQUISITE:** SPAN 2020, or equivalent.

#### **SPAN 3303 - Composition**

**Credit Hours:** (3) **Description:** Designed to develop adequate writing skills; compositions analyzed to identify and avoid frequent grammatical errors and to avoid interference from English. Not intended for students with native or near-native proficiency. **PREREQUISITE:** SPAN 2020 or equivalent.

### SPAN 3304 - Introduction to Hispanic Studies

**Credit Hours:** (3) **Description:** Introduction to Hispanic Studies through the fields of linguistics, literature, culture, and Spanish for the professions. **PREREQUISITE:** SPAN 3301 or 3303 or permission of instructor.

### **SPAN 3308 - Spanish Phonetics**

**Credit Hours:** (3) **Description:** Designed to develop strong pronunciation skills; presents basic principles of Spanish phonetics and examines the features of several dialects of this language. **PREREQUISITE or COREQUISITE:** three 3000 level courses, equivalent, or permission of instructor.

## SPAN 3312 - Adv Conversation

**Credit Hours:** (3) **Description:** Further vocabulary expansion, precision in diction, and ability to express and understand non-technical subjects. **PREREQUISITE:** SPAN 3301, or permission of instructor.

## SPAN 3313 - Advanced Composition

**Credit Hours:** (3) **Description:** Designed to develop strong command of written language; emphasis on style, organization and exposition of content as opposed to grammatical analysis. **PREREQUISITE:** SPAN 3303, or permission of instructor.

## SPAN 4306 - Applied Span Linguistics

**Credit Hours:** (3) **Description:** Current research in linguistics, psycholinguistics and sociolinguistics and their contribution to second language teaching and second-language learning. **PREREQUISITE:** minimum of three 3000-level Spanish courses, equivalent, or permission of instructor.

## SPAN 4307 - Adv Grammar/Writing

**Credit Hours:** (3) **Description:** Special problems in Spanish grammar pertaining to perterite and imperfect, "ser" and "estar"; special verb constructions; subjunctive, definite, indefinite articles; writing styles; vocabulary and idiomatic expressions. **PREREQUISITE:** minimum of three 3000-level Spanish courses or equivalent. Recommended Recommended for major and minor.

## SPAN 4308 - Adv Grammar/Speech

**Credit Hours:** (3) **Description:** Special problems in Spanish grammar pertaining to propositions, placement of descriptive adjectives, passive voice, reflexive substitute, past participle in absolute constructions, relative pronouns; speech production, vocabulary, idiomatic expressions. **PREREQUISITE:** minimum of three 3000-level Spanish courses or equivalent. Recommended Recommended for majors and minors.

## SPAN 4310 - Spanish of Heritage Speakers

**Credit Hours:** (3) **Description:** Designed for heritage and advanced non-native speakers who need to demonstrate strong skills in speaking and writing in a professional setting, i.e., teaching, business, legal, and other areas where this competence will be required to apply for a job. **PREREQUISITE:** demonstration of fluency corresponding to that acquired by a heritage speaker, or minimum of five upper-division Spanish courses, or equivalent, or permission of instructor.

## SPAN 4410 - Spanish Lit and Civilization

**Credit Hours:** (3) **Description:** Survey of literary movements and major figures with readings in literature and civilization. Required of majors. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4431 - Contemporary Spanish Prose

**Credit Hours:** (3) **Description:** Spanish prose from Generation of 1898 to present. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4432 - Contemp Spanish Poetry/Drama

**Credit Hours:** (3) **Description:** Spanish poetry and drama from Generation of 1898 to present. **PREREQUISITE:** minimum of three 3000level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4510 - Spanish Amer Lit/Civilization

**Credit Hours:** (3) **Description:** Survey of literary movements and major figures with readings in literature and civilization. Required of majors. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4561 - Pre-Contemp Span Amer Fiction

**Credit Hours:** (3) **Description:** Development of Spanish American novel and short story from beginnings through 20th century. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4562 - Contemporary Span Amer Fiction

**Credit Hours:** (3) **Description:** Spanish American novel and short story of 20th century. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

#### SPAN 4563 - Hispanic Literature Genres

**Credit Hours:** (3) **Description:** Hispanic literature; selections from origins to present time; emphasis on textual analysis. Required for majors. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

#### SPAN 4564 - Hispanic Cinema

**Credit Hours:** 3 **Description:** Survey of Latin American film, focusing on socio-cultural issues. **PREREQUISITE:** Three upperdivision SPAN courses.

#### SPAN 4701 - Spanish for Commerce I

**Credit Hours:** (3) **Description:** Spanish business terminology and correspondence. **PREREQUISITE:** any 3000-level Spanish course, or permission of instructor.

#### SPAN 4702 - Spanish for Commerce II

**Credit Hours:** (3) **Description:** Business concepts and documents. **PREREQUISITE:** any 3000 level Spanish course, or permission of instructor.

#### SPAN 4703 - Languages/Cultures/Communities

**Credit Hours:** (3) **Description:** Combines Spanish for specific purposes (medical, business, art, etc.) with community service learning; emphasis on civic engagement; **PREREQUISITE or COREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

#### SPAN 4704 - Spanish for Healthcare

**Credit Hours:** (3) **Description:** Study of Spanish related to health professions. Students will gain familiarity with written and oral vocabulary for the assessment of Spanish speaking health professionals in a variety of settings. **PREREQUISITE:** minimum of three 3000-level Spanish courses, or equivalent, or permission of instructor.

## SPAN 4780 - Individual Study Spanish

**Credit Hours:** (1-3) **Description:** Directed individual study in selected areas of Spanish chosen in consultation with instructor. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# SPAN 4790-4799 - Special Topics in Literature and Linguistics

**Credit Hours:** (3) **Description:** Topics in Spanish linguistics, literature or culture designed to be of special interest for the advanced student in Spanish. Repeatable May be repeated for maximum of 9

hours credit. **PREREQUISITE:** minimum of three 3000-level courses in Spanish or equivalent.

# SPED 2000 - Foundation/Exceptional Learn

**Credit Hours:** (3) **Description:** Current research and practices concerning physical, cognitive, emotional, and social characteristics of individuals with exceptionalities; special education laws, educational needs, cultural diversity, inclusion in general education classroom. Field Hours: Additional field experience hours required.

# SPED 2010 - Intro to Comm Disorders

**Credit Hours:** (3) **Description:** Basic principles involved in developing a therapeutic approach to speech/language correction.

# SPED 2030 - Speech Language Phonetics

**Credit Hours:** (3) **Description:** International Phonetics Alphabet and the principles of effective voice usage; emphasis on improving voice, diction, and diction characteristics through exercises in projection, articulation, and pronunciation. **PREREQUISITE:** admission to TEP.

# SPED 2060 - Speech Therapy/Public School

**Credit Hours:** (3) **Description:** Role and responsibilities of speech teacher; legislative foundation of special education with emphasis on the IEP process and procedures. **PREREQUISITE:** admission to TEP.

# SPED 3002 - Indep Study Special Educ

**Credit Hours:** (1-6) **Description:** Opportunity for self-directed study and/or research under supervision. **PREREQUISITE:** consent of department.

# SPED 3201 - Behv Supt Stdnt Diverse Set

**Credit Hours:** (3) **Description:** Identification and education of students with behavioral excesses, including those who have been certified as seriously emotionally disturbed; causative factors, characteristics, appropriate educational placement alternatives and practices. Practicum (30 hrs.) with students with emotional/behavioral disorders and/or pervasive developmental disorders. **PREREQUISITE:** SPED 2000.

# SPED 3310 - Disorders of Speech

**Credit Hours:** (3) **Description:** This course will provide students with some of the basic principles involved in developing a therapeutic approach ot speech correction. Eight (8) hours of field experience. **PREREQUISITE:** admission to TEP.

# SPED 3401 - Academic Support Diverse Lrns

**Credit Hours:** (3) **Description:** Historical and current practices in providing services for students with learning disabilities and related The online catalog can be access

learning problems; characteristics, current research-based instructional practices; special education teacher's role in implementing support services. Practicum (30 hrs.) with students with learning disabilities. **PREREQUISITE:** SPED 2000.

## SPED 3410 - Disorders of Language

**Credit Hours:** (3) **Description:** Study of language disorders as reflected in deficiencies of symbolization and syntax. This course applies the theories of child development, speech and hearing science, and language development to provide intervention for children with language impairments. Eight (8) hours of field experience. **PREREQUISITE:** admission to TEP.

# SPED 3420 - Intro to Audiology

**Credit Hours:** (3) **Description:** Introduction to the study of anatomy, physiology and pathologies of the auditory system which focuses on the theory and practice of results. **PREREQUISITE:** admission to TEP.

## SPED 3440 - Non Verbal Comm/Stdnt Disablty

**Credit Hours:** (3) **Description:** Introduction to Augmentative and Alternative Communication (AAC) systems to provide opportunities to learn about communication techniques for students with severe speech and language impairments, hearing loss, physical disabilities, and cognitive impairments. Cultural differences in communication will also be discussed.

# SPED 3501 - Suprt Stdnt/Mental Retardation

**Credit Hours:** (3) **Description:** Definitions, etiology, and characteristics associated with mild to severe mental retardation; examination of evaluation, services and strategies used in educational, prevocational, and transitional settings; access and use of assistive technology. Practicum (30 hrs.) with students with mental retardation. **PREREQUISITE:** SPED 2000.

# SPED 3610 - Speech Therapy Methods

**Credit Hours:** (3) **Description:** Study of traditional and current approaches and instructional strategies for teaching preschool and school age learners with speech and language and hearing impairments.

# SPED 3800 - Methods I/Instruct/Literacy

**Credit Hours:** (3) **Description:** Study of current best practices and methods for general and literacy instruction used in special education and inclusive classrooms. Field Hours: Additional field experience hours required. **PREREQUISITE:** SPED 2000.

# SPED 3801 - Practicum/Inclusive Settings

**Credit Hours:** (2-3) **Description:** Planning and implementation of special education methods and materials with learners having mild

disabilities. Practicum: 90 hours. **COREQUISITE:** SPED 3800, SPED 3804.

## SPED 3802 - Ed Assessment/Inclusive Set

**Credit Hours:** (3) **Description:** Tests and measurements used with learners having disabilities; diagnostic achievement testing as related to instructional planning. Includes other major assessment instruments and procedures used in evaluation of mild to severe exceptionalities. Field Hours: Additional field experience hours required. **PREREQUISITE:** SPED 2000 and Admission to TEP.

## SPED 3803 - Classroom/Behavior Management

**Credit Hours:** (3) **Description:** Advanced strategies for managing social behaviors of learners with mild to severe disabilities; techniques for eliminating maladaptive behaviors, managing aggressive and antisocial students, and teaching appropriate social skills. Field Hours: Additional Field experience hours required. **PREREQUISITE:** SPED 2000.

## SPED 3804 - SPED Methods II. Content Area

**Credit Hours:** (3) **Description:** Study of best practices and methods for mathematics, social studies, and science instruction currently used in special education and inclusive settings; curriculum for transition and daily living skills; assistive technology for education. Field Hours: Additional field experience hours required.

## SPED 4000 - Meth/Mat Modrt/Severe Dis

**Credit Hours:** (3) **Description:** Curriculum, methods, and materials applicable to special educational needs of learners with moderate to severe disabilities; emphasis on educational and vocational skills that facilitate normalization and independent living. **PREREQUISITE:** SPED 3800, SPED 3801. **COREQUISITE:** SPED 4001.

# SPED 4001 - Modrt/Sevr Dsblty Practicum

**Credit Hours:** (3) **Description:** Planning and implementation of special education methods and materials with learners having moderate to severe disabilities. **PREREQUISITE:** SPED 3800, SPED 3801. **COREQUISITE:** SPED 4000. (S/U).

# SPED 4010 - Anatomy/Physiology Spch/Hear

**Credit Hours:** (3) **Description:** This course will provide functional background in the anatomy and physiology of hearing, speech, and swallowing, which will allow the student to communicate with speech-language pathologists and related professionals in public school setting.

# SPED 4020 - Language/Comm/Diverse Classrm

**Credit Hours:** (3) **Description:** Instruction for students with typical and exceptional communication needs; interpreting speech/language assessment reports and designing instruction; use of augmentative and

1329 alternative communication devices and working with non-native English speaking students. Field Hours: Additional field experience hours required. **PREREQUISITE:** Admission to TEP

## SPED 4050 - Diagnostic Proc/Therapy Technq

**Credit Hours:** (3) **Description:** Designed to develop proficiency in administering and interpreting diagnostic procedures in speech and language disorders with specific methods and materials for remediation. **PREREQUISITE:** admission to TEP.

# SPED 4101-4110 - Special Topics in Special Education

**Credit Hours:** (1-3) **Description:** Investigation in selected areas of special education. Topics are varied and in online class listings.

## SPED 4111 - Intro/Appl Behav Analysis

**Credit Hours:** (3) **Description:** Principles and procedures of applied behavior analysis with emphasis on application to change human behavior.

## SPED 4112 - Assess/Measure/Appl Behav Anly

**Credit Hours:** (3) **Description:** Methods involved in conducting and interpreting common behavioral assessments, measuring behavior, and data analysis using single subject designs.

## SPED 4113 - Appl Behav Intervent/Strateg

**Credit Hours:** (3) **Description:** Overview of the instructional strategies developed from applied behavior analysis including Direct Instruction, Precision Teaching, Discrete Trial Training, and others; knowledge and skills to provide effective instruction to students with disabilities.

## SPED 4114 - Practitioner Issues/ABA

**Credit Hours:** (3) **Description:** Advanced concepts in Applied Behavior Analysis; ethical issues, behavior change systems, staff training, and professional conduct.

## SPED 4513 - Assistive Tech/Trans Instruc

**Credit Hours:** (3) **Description:** Transition issues, life skills, vocational education to prepare students having significant exceptionalities for community living; legal and family concerns; effective transition programming; familiarity with available community resources and interagency collaboration; augmentative/alternative communication. **PREREQUISITE:** SPED 3501 or SPED 4900.

## SPED 4601 - Student Phys/Health Dis

**Credit Hours:** (3) **Former:** (3601) **Description:** Educational and environmental modifications; accommodations to facilitate learning and vocational skills in general and special education; characteristics and etiology of mild to severe physical/health disabilities; supportive educational, medical, therapeutic interventions. Practicum (30 hrs.) with students with physical/health disabilities. **PREREQUISITE:** SPED 2000.

# SPED 4801-4810 - Workshop in Special Education

**Credit Hours:** (1-9) **Description:** For professionals in field of special education. Intensive examination of current methodologies, research, issues and trends in various areas of exceptionalities. See online class listings for specific workshop title.

# SPED 4900 - Consultation Schl/Fmly/Cmty

**Credit Hours:** (3) **Description:** Professional development issues which impact on educator interaction with students, parents and other professionals, including the development of communication and consultation skills. Practicum included.

## SLC 4001 - Sport Sales/Revenue Prod I

**Credit Hours:** (3) **Description:** Analysis of skills essential to revenue production and sales processes in sport business. **PREREQUISITE:** PREREQUISITE: permission of instructor.

# SLC 4002 - Sport Sales/Revenue Prod II

**Credit Hours:** (3) **Description:** Skills essential to managing existing customer sales in sport business. **PREREQUISITE:** successful completion of SLC 4001.

# SLC 4102-4111 - Special Topics Workshop in Sport and Leisure Commerce

**Credit Hours:** (1-6) **Description:** Selected phases of sport and leisure commerce through group study, in-depth study in area of interest and need for leaders in sport and leisure commerce. May be repeated for credit when topic varies.

# SLC 4393 - Introduction to eSports

**Credit Hours:** (3) **Description:** Introduction to eSports is an introductory examination into the growing industry of competitive gaming. Topics include the history of eSports, management of eSports, the creation and implementation of eSports events, and career opportunities within the eSports segment of the sport industry.

# SLC 4410 - College Athletics Compliance

**Credit Hours:** (3) **Description:** Explore how college athletic departments comply with rules and regulations of the NCAA in the

1330 conduct of its intercollegiate athletics programs. Includes rules education, knowledge of violations and infractions, and investigation.

# SLC 4622 - Fan Behavior/Rivalry \*\*

**Credit Hours:** (3) **Description:** Overview of factors that influence sport fan behavior including why people become fans of sport teams, influence of rivalry on fan behavior, and expected outcomes of fan behavior and rivalry.

# SLC 4800 - Adv Computer Apps in SPRT \*\*

**Credit Hours:** (3) **Description:** Evolution, current application, and future potential of computers for sport commerce. **PREREQUISITE:** Permission of instructor.

# SLC 4902-4911 - Special Topics in Sport and Leisure Commerce

**Credit Hours:** (1-3) **Description:** Current topics in sport and leisure commerce. May be repeated with change in topic. Topics are varied and in online class listings.

# SLS 1005 - Condtn & Leadership: Var Sport\*\*

**Credit Hours:** (2) **Description:** (Same as PHED 1005) Open only to varsity athletes and members of Spirit Squad. May be repeated for credit. (S/U)

# SLS 1417 - Student-Ath Lead Dev in Sport

**Credit Hours:** (3) **Description:** This class is designed to provide student athletes with a strong base of knowledge and experience as they prepare to assume responsibility for leadership within and outside of their roles as student athletes. The class will provide students with an understanding of their individual leadership styles and the practice of leadership in individual and team sports. The primary purpose of this course is to facilitate learning opportunities and experiences for student athletes, which will provide students with the knowledge, attitudes, and skills necessary to lead their team, campus and community. Practices of successful leaders in sport will be examined, as will prominent leadership theory.

# SLS 2105 - Foundation/Sport/Leisure Mgt \*\*

**Credit Hours:** (4) **Description:** Overview of sport and leisure from philosophical, historical, and organizational perspectives. Further emphasizes the role of sport and leisure programs in communities, schools, commercial settings, and industrial settings, while also providing an introduction to professional and career development. Includes a 40 contact hour field experience.

# SLS 2590-2591 - Special Topics in Sports and Leisure Management

**Credit Hours:** (1-3) **Description:** Current topics in sport and leisure management. May be repeated for credit with change in topic. Repeatable May be repeated for a maximum of 12 hours credit when topic varies.

## SLS 2605 - Field Experience in SLM \*\*

**Credit Hours:** (1-12) **Description:** Allows students entering Sport and Leisure Management program early, supervised practical experiences in a variety of sport and leisure service areas. (S/U).

# SLS 3005 - Computer Applctn Sport/Leisure \*\*

**Credit Hours:** (3) **Description:** History and application of computers and information systems; emphasis on hardware and software relevant to sport and leisure programs as well as applications of common computer programs to specific leisure service and sport management situations.

# SLS 3103 - Outdoor Rec/Ed Urban America \*\*

**Credit Hours:** (3) **Description:** Analysis of concepts and issues associated with outdoor recreation and education with an emphasis on urban citizen; outdoor recreation behavior in terms of individual dynamics of participation, resources for outdoor recreation, outdoor education, and outdoor leadership; achieves balance among practical information, theory, and information from current research.

# SLS 3104 - Commercial Rec and Tourism \*\*

**Credit Hours:** (3) **Description:** Survey of urban commercial recreation with special emphasis on travel and tourism; sport and athletics, theaters, fitness centers, amusement and theme parks, aquatic areas, risk recreation, and historical areas, as well as the travel and tourism industry. **PREREQUISITE:** SLS 2105.

# SLS 3105 - Sport/Leisure as Pop Culture \*\*

**Credit Hours:** (3) **Description:** The analysis of the production and consumption of sport and leisure as an aspect of contemporary popular culture; relationship between sport and leisure and the economy, the media, politics, and the experience of class, race, gender, ethnicity, and nationality.

# SLS 3141 - Experiential Learning Credit

**Credit Hours:** (1-12) **Description:** A systematic process for evaluating and credentialing undergraduate-level learning gained in a variety of contexts. Students will provide docuemntation of undergraduate-level knowledge and skills garnered in non-traditional settings to expert faculty reviewers. (S/U)

# SLS 3202 - Park/Recreation Resource Mgmt

**Credit Hours:** (3) **Description:** Management, operation, and maintenance of areas and facilities within field of recreation and parks;

identification, acquisition, allocation, development, and management of land and water resources through environmentally sound techniques.

1331

# SLS 3204 - Org Analysis Sport/Leisure \*\*

**Credit Hours:** (3) **Description:** Analysis of the organization and administration of sport and leisure service organizations; organizational structuring; goals, objectives, and policy development; planning process; personnel development; risk management; conflict resolution as applied to sport and leisure services. **PREREQUISITE:** SLS 2105.

## SLS 3205 - Venue Planning and Management

**Credit Hours:** (3) **Description:** Principles of planning areas and facilities for sports and recreation are explored. Design and construction of specific sport and recreation facilities, approaches to standards and regional planning will be discussed. Problems, funding issues, maintenance, use, and trends of sport and recreation facilities will be analyzed.

# SLS 3305 - Leisure/Recreation Prog DevIp \*\*

**Credit Hours:** (3) **Description:** Planning techniques in regard to citizen surveys, leisure and recreation needs analysis, leisure and recreation activity selection, and leisure and recreation program design, promotion, and evaluation.

## SLS 3600 - Event Management

**Credit Hours:** (3) **Description:** Basic concepts pertaining to production of sporting events, both amateur and professional; planning, organizing, publicizing, and conducting an event.

# SLS 3605 - Financial Management SLS \*\*

**Credit Hours:** (3) **Description:** Basic finance and accounting applied to managerial control of sport and leisure organizations; feasibility analysis, formulation and development of operating budgets, financial forecasting, ownership models, taxation issues, and revenue production. **PREREQUISITE:** SLS 2105.

## SLS 3650 - Promotions in Sport & Leisure \*\*

**Credit Hours:** (3) **Description:** Basic knowledge and understanding of promotions and public relations in both amateur and professional sport; special emphasis is placed on building and maintaining an effective promotional campaign in the sport and leisure industry, which includes strategies for sponsorships, ticket sales, social media, and community relations. **PREREQUISITE:** SLS 2105.

## SLS 3905 - Leisure/Recr Disabilities

**Credit Hours:** (3) **Description:** Examination of role of leisure and recreation for persons with special needs including individuals with physical, emotional, mental, and social disabilities.

## SLS 4001 - Park/Rec Visitor Mgmt \*\*

**Credit Hours:** (3) **Description:** Visitor management as it relates to design and management of visitor interpretive and educational services; attended and unattended services including interpretive talks, living interpretation, audio devices, self-guided tours, exhibits, and educational publications. This course may be taken to improve the grade for one, but not both, of the former courses.

# SLS 4105 - Leadership Development in SLM

#### Credit Hours: (3) Description:

An examination of leadership issues in sport and recreational organizati ons designed to help students to explore personal and professional lead ership theories and to apply critical thinking skills in recreation and spo rt professions. The course will also touch on nonprofit development (fundraising) techniques.

# SLS 4125 - Gender/Race/Class Urb Sp/Lei \*\*

**Credit Hours:** (3) **Description:** Socially constructed categories of class, race, and gender, and their influence on perceptions of the body; way these categories shape institutionalization, practice, and representation of sport and leisure is discussed with an emphasis on promoting unbiased and non-prejudicial sport and leisure cultures. **PREREQUISITE:** SLS 3105, or permission of the instructor.

# SLS 4135 - Sport/Culture Global Perspect \*\*

**Credit Hours:** (3) **Description:** Nature, meaning, and significance of sport, leisure, and popular culture across selected nations. Identification and systematic analysis of persistent problems in American sport and popular culture as well as cultural interstices in emerging global village; cultural conflict, cultural resistance, and cultural imperialism. **PREREQUISITE:** SLS 2105. **PREREQUISITE or COREQUISITE:** Social Sciences requirement, SLS 3105, or permission of instructor.

# SLS 4141 - Chronology of Sport \*\*

**Credit Hours:** (3) **Description:** Historical development of sport from either a general or sport-specific perspective including the growth of competition, the rise of sport(s), management of sport, changing function of sport, chronicles of sport as business and history of the relationship between sport and other institutions. May be repeated for a maximum of 9 hours credit when change of topic.

# SLS 4155 - Sport/Leisure Governance \*\*

**Credit Hours:** (3) **Description:** Development and enforcement of policy by and within governing bodies and systems specifically for local, national, and international sport and leisure organizations. **PREREQUISITE:** SLS 3204 or permission of instructor.

# SLS 4165 - Sport/Global City

1332 **Credit Hours:** (3) **Description:** Synergies and disjunctures between the U.S. and global sport and leisure marketplace. PREREQUISITE or COREQUISITE: SLS 3105, or permission of instructor.

# SLS 4175 - InternationI Persp Sport Mgmt

**Credit Hours:** (3) **Description:** Management of sport and leisure organizations in a global context.

# SLS 4205 - Legal Aspects SLM \*\*

**Credit Hours:** (3) **Description:** Overview of the legal system's role in the provision of sport products and services. This course provides a basic understanding of the legal system, constitutional law, negligence law, risk management, intentional torts and criminal acts, antitrust and labor law, contract law, intellectual property law, and gender discrimination legislation and statutes. **PREREQUISITE:** SLS 2105 or permission of instructor.

# SLS 4500 - Sport/Leisure Mktg \*\*

**Credit Hours:** (3) **Description:** Basic marketing concepts with applications to the uniqueness of the sport and leisure industry; event marketing, sponsorship, licensing, sport information and public relations. **PREREQUISITE:** SLS 2105, SLS 3105.

# SLS 4509 - Christianity Culture Sport/Rec \*\*

#### **Credit Hours: (3) Description:**

Phenomenon of the Christian sport and recreation ministry; sport and re creation programs managed by churches and other Christian organizati ons; philosophy, values, and objectives of having such programs; the re ciprocal influence between sport and Christianity; the modern negotiati on of Christian values and the values presented by competitive, comme reialized sport.

# SLS 4590-4591 - Special Topic in Sports and Leisure Management

**Credit Hours:** (1-3) **Description:** Current topics in sport and leisure management. May be repeated for credit with change in topic. Repeatable May be repeated for a maximum of 12 hours credit when topic varies.

# SLS 4603 - Administration of Athletics \*\*

**Credit Hours:** (3) **Description:** This course examines sport within American higher education institutions, providing extensive factual information and relevant examples to prepare students for a career in intercollegiate athletics management. The course is designed to reveal the inner workings of athletic departments as well as the governing associations that impact them. Using examples from institutions of varying sizes and representing the various conferences, associations, and divisions, this course further provides students a comprehensive view of athletic administration procedures.

# SLS 4605 - Senior SLM Capstone Experience \*\*

**Credit Hours:** (3-12) **Description:** Supervised professional work experience in the sport industry through positions in professional and intercollegiate sports, arenas, sport marketing and management firms, community and faith-based organizations, and other sport entities. Analysis paper and oral presentation required. Represents a culminating experience and can only be conducted when all other core coursework is complete. **PREREQUISITE:** Senior status and permission of advisor and coordinator of internships.

High Impact Practice Code: Service Learning

# SLS 4841 - Interscholastic Athletic Administration

**Credit Hours:** (3) **Description:** This course will delve into the administration of secondary educational athletics. This will include a complete study of philosophy, personnel policies, financial policies, general athletic policies, and student athlete guidelines.

# SCMS 2610 - Introduction to Supply Chain Management \*\*

**Credit Hours:** (3) **Former:** (MKTG 2610, 3610) **Description:** Purchasing and supply management; operations management; transportation and logistics.

# SCMS 2710 - Business Analytics -Statistics \*\*

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Focus on critical thinking; introduction to business statistics methods and software for the collection, summarization, analysis and interpretation of business data for managerial decision making; methods include descriptive statistics, numerical and graphical, sampling techniques and sampling distributions, basic concepts of probability, and hypothesis testing. **PREREQUISITE:** MATH 1710 or MATH 1830 or MATH 1910 or MATH 1421.

# SCMS 3510 - Operations Management \*\*

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Operations as a key element of organizational strategy from a competitive viewpoint. Integration of various techniques to facilitate solution to productivity and quality issues in both manufacturing and service industries using multifunctional approaches in the creation of goods and services. **PREREQUISITE:** SCMS 3711.

# SCMS 3711 - Business Analytics - Tools \*\*

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Focus on critical thinking; introduction to predictive and prescriptive analytics methods and software for analysis and interpretation of common business decisions; regression, time series, and big-data analyses; linear and network models; waiting line systems and computer simulation modeling. **PREREQUISITE:** SCMS 2710 or MATH 1530.

#### <sup>1333</sup> SCMS 4510 - Operations Planning and Resources Management

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Continuation of SCMS 3510. Focus on planning and management of material flows in internal and external supply chains for effectively delivering value to the customer. **PREREQUISITE:** SCMS 3510.

# SCMS 4511 - Supply Chain Strategy

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Comprehensive study of development, execution and measurement of integrated supply chain management strategies. **PREREQUISITE:** SCMS 3510, SCMS 2610.

# SCMS 4512 - Current Topics in Supply Chain Management

**Credit Hours:** (3) **Former:** (ISDS) **Description:** Current topics in supply chain management. **PREREQUISITE:** SCMS 2610, or permission of instructor.

# SCMS 4620 - Logistics Management

**Credit Hours:** (3) **Former:** (MKTG) (SCMS 3620) **Description:** Analysis of logistics activities, distribution network alternatives, and customer service aspects; examination of freight traffic function within firm's logistics system, analysis of rate and classification systems, and carrier selection; evaluation of logistics procedures and strategies and their appropriateness to different industries. **PREREQUISITE:** SCMS 2610.

# SCMS 4650 - Supply Management

**Credit Hours:** (3) **Former:** (MKTG) (SCMS 3650) **Description:** Role of purchasing function within organization; purchasing process; procurement and commodity strategy; insourcing/outsourcing; supplies evaluation and selection; supplier management and development; global sourcing; cost and price analysis; negotiation; contract management; new product development. **PREREQUISITE:** SCMS 2610.

# SCMS 4810 - Problems in Supply Chain Management

**Credit Hours:** (1-6) **Former:** (MKTG) **Description:** Conduct approved research project in supply chain management area under supervision of faculty member. **PREREQUISITE:** SCMS 2610, junior standing and permission of department chair or Supply Chain Management program coordinator.

# SCMS 4811 - Internship in Supply Chain Management

**Credit Hours:** (1-6) **Former:** (MKTG) **Description:** Internship in an organization to gain on-the-job supply chain mgmt. experience. Course offered by permit only. Permits obtained online and issued by the Fogelman Professional Development Center. Academic credit approval and the evaluation methods are determined by a MSCM faculty member. **PREREQUISITE:** SCMS 2610 and Junior or Senior standing.

# SCMS 4996 - Senior Honors Thesis

**Credit Hours:** (3) **Description:** Independent research open only to students enrolled in the Honors Program. Thesis supervised by area faculty member. **PREREQUISITE:** senior standing and permission of the Director of the College Honors Program.

# TEAE 4260 - Teach ESL w/Internet Tech

Credit Hours: (3)

#### **TEAE 4300 - Multicultural Education**

**Credit Hours:** (3)

# TEAE 4550 - Latin Amer/Country/Peop

Credit Hours: (3)

#### **TELC 2013 - Adult Learner**

**Credit Hours:** (3)

TELC 2015 - Excptnl/Diverse Post Sc

**Credit Hours:** (3)

#### TELC 2016 - Agent/Change/Post Secon

Credit Hours: (3)

# TELC 4005 - Teaching and Learning w/Tech\*\*

**Credit Hours:** (3)

# TEAS 4001 - Col Prac/Trnd/Issue/Char Sp Ed

**Credit Hours:** (4)

# **TEAS 4003 - Assess Procedure in Special Ed**

**Credit Hours:** (3)

# TEAS 4004 - Appl Behavior Interven/Suppt

Credit Hours: (4)

#### 1334 TEAS 4005 - Read Methods Across Curriculum

Credit Hours: (3)

#### **TEAS 4007 - Math Method Across Curr**

Credit Hours: (3)

### TEAS 4008 - Teach Mild/Moderate

Credit Hours: (4)

# **TEAS 4009 - Adaptive PE in Special Educ**

Credit Hours: (2)

# **TEAS 4010 - Methods Instruct/Teach Compre**

Credit Hours: (4)

# TEAS 4012 - Instruction: Early Child/Sp Ed

Credit Hours: (4)

# THEA 1030 - Intro to Theatre\*\*

**Credit Hours:** (3) **Description:** Experiential, conceptual, historical, and cultural study of theatre as a unique form of artistic expression and mirror of human experiences and values throughout the world; survey of constituent elements of a theatrical work and its major forms of expression. Attendance at live theatre productions required. **[G]** 

High Impact Practice Code: Internship

# **THEA 1561 - Introduction to Design**

**Credit Hours:** (3) **Description:** Historical and conceptual survey of basic elements of production, scenery, costumes, lighting, sound, and their relation to theatrical production process.

#### **THEA 2501 - Stage Movement**

**Credit Hours:** (3) **Description:** Introduction to movement as basic element of actor's craft; freeing the body/mind in order to understand. develop, recognize natural physical actions and rhythms and their application to stage. **PREREQUISITE:** permission of instructor.

# THEA 2503 - Basic Keyboard Skills/Actors

**Credit Hours:** (1) **Description:** Study of basic keyboard ability to aid the comprehensive theatre professional.

# THEA 2504 - Singing for the Actor

**Credit Hours:** (3) **Description:** Study of basic singing techniques. Specific emphasis will be placed on vocal aesthetics appropriate for the genre of American Musical Theatre. Repeatable May be repeated for 9 hours credit.

# THEA 2505 - Functional Keyboarding skills for Actors

**Credit Hours:** (1) **Description:** Continued development of basic keyboarding ability to aid the comprehensive musical theatre professional. Special emphasis on real world applications for Musical Theatre literature preparation and auditions. **PREREQUISITE:** THEA 2503, THEA 4224 or permission of instructor.

# **THEA 2511 - Intro Theatre Production**

**Credit Hours:** (3) **Description:** Lecture/laboratory covering all phases of craft skills and equipment involved in technical theatre production. Required lab work.

# **THEA 2512 - Intro Theatre Graphics**

**Credit Hours:** (2) **Description:** Introduction to graphic communication processes of technical theatre. Mechanical drafting and CAD for scenery, properties, sound and lighting design; poster and program graphics. (Offered alternate years)

# **THEA 2514 - Theatre Drafting**

**Credit Hours:** (2) **Description:** Introduction of drafting as a graphic communication device via CAD software. Emphasis on industry standards and expectations through relaized projects and working documents. (offered alternate years)

# THEA 2515 - Stage Makeup

**Credit Hours:** (2) **Description:** Fundamentals of theatrical makeup through hands-on projects in basic stage contour and corrective, old age and character, transformation and fantasy, as well as specialty techniques, such as scars, wounds. Introduction to fundamentals of facial hair and wig application. Open to non-majors with permission of instructor.

# THEA 2530 - Acting/Non-Majors

**Credit Hours:** (3) **Description:** Introduction to craft of acting; development of actor's individual potential through basic technique; performance of short scenes in class.

# THEA 2532 - Acting I

**Credit Hours:** (3) **Description:** Development of character through dramatic action utilizing monologue, scene, improvisational work. **PREREQUISITE:** THEA 2531, or permission of instructor.

#### **THEA 3200 - Musical Theatre Applied Voice**

1335 **Credit Hours:** (1-2) **Description:** Individual vocal study with emphasis on musical theatre literature. Repeatable May be repeated for a maximum of 8 hours credit. **PREREQUISITE:** THEA 2504 and THEA 4224, or permission of instructor.

# THEA 3212 - Vocal Prod & Articulation I

**Credit Hours:** (3) **Former:** Dynamics/Vocal Prod I **Description:** Interrelation of body and voice in performance; freeing the voice through posture related breathing; exploring phonation through body dynamics; using consonant energy in text. **PREREQUISITE:** permission of instructor.

# THEA 3213 - Vocal Prod & Articulation II

**Credit Hours:** (3) **Description:** Further explorations in the interrelation of body and voice in performance particularly pitch and resonance, consonant, tonal, and structural energies in text. **PREREQUISITE:** THEA 3212, or permission of instructor.

# **THEA 3412 - Directing Experiments**

**Credit Hours:** (3) **Description:** Theatrical image; creative exercises in imaginative use of space, time, and materials as they relate to stage direction and design.

# **THEA 3505 - Movement Styles**

**Credit Hours:** (3) **Description:** Exploration of physical movement relevant to the actor in performance situations. **PREREQUISITE:** THEA 2501, or permission of instructor.

# **THEA 3506 - Stage Combat**

**Credit Hours:** (3) **Description:** Rapier, dagger, and unarmed combat. **PREREQUISITE:** permission of instructor.

# THEA 3511 - Stagecraft

**Credit Hours:** (3) Lecture/laboratory includes theatre terminology, props and scenery construction skills, job descriptions, and safety; scenery construction to include 2D & 3D scenery and introduction to steel materials and welding; props construction to include electrical basics, molding / casting and sculptural work. Required lab work. (Offered alternate years) **PREREQUISITE:** THEA 2511.

# **THEA 3515 - Costume Construction**

**Credit Hours:** (3) **Former:** (Was 2513) **Description:** Introductory course in the construction or patterning of theatrical garments, with topic rotating on alternating years. Construction-focused class may focus on cutting, pattern alterations, machine and hand sewing techniques, and creating complete garments for stage. Pattern-focused class may focus on the fundamentals of draping, flat patterning, and translating a 2D theatrical rendering to a realized garment pattern. May be repeated for a maximum of 6 credit hours. PREREQUISITE: THEA

2511, THEA 3602, or permission of instructor. **PREREQUISITE:** THEA 2511, THEA 3602, or permission of instructor.

# THEA 3531 - Acting II

**Credit Hours:** (3) **Description:** Development of partnership work within scenes. **PREREQUISITE:** THEA 2532, or permission of instructor.

# THEA 3532 - Acting III

**Credit Hours:** (3) **Description:** Development of ensemble work within scenes. **PREREQUISITE:** THEA 3531, permission of instructor.

# **THEA 3551 - Audition Prep Performance**

**Credit Hours:** (3) **Description:** Exploration of audition process from material selection to final presentation; practical business information (resume, photo and job opportunities.) **PREREQUISITE:** permission of instructor.

#### **THEA 3561 - Principles Scene Design**

**Credit Hours:** (3) **Description:** Application of principles to various theatrical conventions and configurations. (Offered alternate years)

### **THEA 3562 - Principles Costume Dsgn**

**Credit Hours:** (3) **Description:** Techniques of costume design with special attention to character interpretation and design visualization. Open to non-majors with permission of instructor. (Offered alternate years)

# THEA 3563 - Principles of Light & Sound Design

**Credit Hours:** (3) **Description:** Exploration of the tools and skills used in the creation of theatrical lighting and sound designs; historical development of design, basic script analysis, production processes and design aestheics, common procedures and practices for working designers in the fields of lighting and sound design.

#### THEA 3601 - Mgmt/Publicity Prod Lab

**Credit Hours:** (1)

#### **THEA 3602 - Costumes Production Lab**

**Credit Hours:** (1)

#### **THEA 3603 - Lighting and Sound Production Lab**

**Credit Hours:** (1)

#### THEA 3605 - Scenery Production Lab

Credit Hours: (1)

#### **THEA 3606 - Props Production Lab**

Credit Hours: (1)

### **THEA 3608 - Dance Production Lab**

**Credit Hours:** (1)

#### THEA 3609 - Stage Management Lab

**Credit Hours:** (1) Repeatable May be repeated for a maximum of 3 hours credit with permission of instructor.

#### **THEA 3620 - Stage Management Skills**

**Credit Hours:** (3) **Description:** Exploration of the basic tools and knowledge necessary to stage manage in the theatre. Repeatable May be repeated for a maximum of 9 hours credit. **PREREQUISITE:** Permission of instructor.

# **THEA 3621 - Introduction to Prop Craft**

**Credit Hours:** (2) **Description:** Expansion of the theatrical vocabulary while developing hands on techniques of prop artisanship as a discipline within the larger context of theatre production. (Offered alternate years)

#### **THEA 4209 - Advanced Scenic Production**

**Credit Hours:** (3) **Description:** Processes and techniques employed by theatre technicians and designers in the design, planning, and construction of scenery, structures and effects; survey of theatrical scenery types and traditional methodologies for problem solving. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission of instructor.

# THEA 4210-4219 - Special Topics in Theatre

**Credit Hours:** (1-3) **Description:** Topics are varied and in the online class listings. Repeatable May be repeated for a maximum of 9 hours credit when topic varies.

# THEA 4220 - Acting through Song I

**Credit Hours:** (3) **Description:** Exploration of techniques that allow the performer to fuse the act of acting and singing. Two lecture hours, two laboratory hours per week. **PREREQUISITE:** THEA 2532, MUAP 1100, 1610, or equivalency exam/audition and permission of instructor.

#### **THEA 4221 - Stage Dialects**

**Credit Hours:** (3) **Description:** Transcription for International Phonetic Alphabet (IPA). Voice and dialect technique for conveying dramatic intention and character. (Offered alternate years) **PREREQUISITE:** permission of instructor.

# THEA 4222 - Asian Theatre

**Credit Hours:** (3) **Description:** History and theory of traditional and contemporary theatre forms in Asia; study of cultural and social history. (Offered alternate years) **PREREQUISITE:** permission of instructor.

# THEA 4223 - Acting through Song II

**Credit Hours:** (3) **Description:** Further exploration of techniques that allow the performer to fuse the act of acting and singing. (Offered alternate years) **PREREQUISITE:** THEA 2532, MUAP 1100, MUAP 1610, and MUAP 4220 or equivalency exam/audition and permission of instructor.

# THEA 4224 - Principle/Music Theory/Theatre

**Credit Hours:** (3) **Description:** Study of basic written music theory and aural skills to aid the comprehensive theatre professional.

# **THEA 4441 - Performance Repertory**

**Credit Hours:** (3) **Description:** Group performance in dramatic and narrative theatre styles as well as dance and theatre movement. Repeatable May be repeated for a maximum of 9 hours credit.

#### **THEA 4455 - Directing Narrative Theatre**

**Credit Hours:** (3) **Description:** Directing techniques for staging literary texts not originally written for the theatre. Includes script adaptation of short stories, poetry, and non-fiction prose. Directing projects required. (Offered alternate years) **PREREQUISITE:** THEA 4521, or permission of instructor.

#### **THEA 4457 - Vocal Style/Performance**

**Credit Hours:** (3) **Description:** Exploration of language based characterization as it evolves from structure and style of text. **PREREQUISITE:** THEA 3212, or permission of instructor.

# THEA 4501 - Adv Movement Styles

**Credit Hours:** (3) **Description:** Study in advanced physical theatre styles. Varied semester topics: solo performance, performance art; fighting styles for period weapons, physical theatre techniques for theatre teachers, choreographers and directors. Repeatable May be repeated for a maximum of 6 hours credit when content varies. (Offered alternate years) **PREREQUISITE:** permission of instructor.

1337 **Credit Hours:** (3) **Description:** Basic techniques and theories for use of dramatization in elementary and secondary education. Includes socio-drama, dramatization of school subjects and daily concerns, and improvisation and creation of dramatic plays. (Offered alternate years).

### **THEA 4511 - Automation & Mechanization**

**Credit Hours:** (2) **Description:** Training in the typical applications of pneumatic, hydraulic, and motorized systems as well as electronic and automated controls of thes systems. (Offered alternate years)

# **THEA 4512 - Digital Rendering**

**Credit Hours:** (2) **Description:** Training in digital media programs to generate theatrical renderings for Scenic, Costume and Lighting design. Software technology includes Introductory Photoshop, Corel Paint, and Illustrator tools, techniques, and organizational methodologies. (Offered alternate years)

#### **THEA 4513 - Digital Fabrication**

**Credit Hours:** (2) **Description:** Training in digital fabrication equipment such as a laser cutter, 3D printer and CNC router to improve the student's knowledge and skill level. Outcomes include proficiency in 3D drafting, 3D scale model creation and layout techniques. (Offered alternate years)

#### **THEA 4514 - Theatre Rendering Techniques**

**Credit Hours:** (3) **Description:** Materials and techniques for rendering theatrical space and scenic, costume, lighting, and properties design elements. (Offered alternate years).

#### **THEA 4515 - Scene Painting**

**Credit Hours:** (3) **Description:** Various techniques of painting scenery for stage. (Offered alternate years) **PREREQUISITE:** THEA 3561.

#### **THEA 4516 - Technical Direction**

**Credit Hours:** (3) Lecture/laboratory for theatre technicians includes production organization and safety, engineering, rigging, materials control and supply ordering. (Offered alternate years) **PREREQUISITE:** THEA 3511.

#### THEA 4517 - Scene Painting II

**Credit Hours:** (2) **Description:** Examination of advanced scenic art techniques including additive and subtractive sculpting in the creation of dimensial objects such as cartouches, relief carvings, sculptures, and other dimensional scenic elements. **PREREQUISITE:** THEA 3561.

# **THEA 4521 - Principles of Stage Direction**

# **THEA 4503 - Creative Dramatics**

**Credit Hours:** (3) **Description:** Exploration of conceptual, planning and implementation skills of stage director from script interpretation to rehearsal and performance; attention to both traditional and non-traditional theatrical modes. Directing projects required. (Offered alternate years) **PREREQUISITE:** THEA 3412, or permission of instructor.

### **THEA 4531 - Acting Styles**

**Credit Hours:** (3) **Description:** Development of acting styles as influenced by environments of historical periods. Repeatable May be repeated for maximum of 6 hours credit with change of course content. **PREREQUISITE:** THEA 3532, or permission of instructor.

# **THEA 4532 - Mask Performance**

**Credit Hours:** (3) **Description:** Varied semester topics: Commedia dell'arte performance; creation and performance of the character mask; mask work based in physical theatre. Repeatable May be repeated for a maximum of 6 hours credit when content varies. **PREREQUISITE:** permission of instructor.

# **THEA 4539 - Contemporary Theatre History**

**Credit Hours:** (3) **Description:** An examination of the movement and trends in theatre during the 20th and 21st centuries. Fee Theatre *Cross listing:* THEA 6539

# THEA 4541 - Internship

**Credit Hours:** (1-3) **Description:** Supervised work in actual university, community, or professional theatre productions on internship basis. Credit varies with amount of time and responsibility involved. **PREREQUISITE:** permission of instructor.

# THEA 4544 - Gay and Lesbian Dramatic Lit

**Credit Hours:** (3) **Description:** An overview of the theatre and dramatic literature reflecting the gay and lesbian experience in America in teh 20th and 21st centuries.

#### THEA 4545 - Thea/African Diaspora

**Credit Hours:** (3) **Description:** Exploration of selected playwrights and theatre practitioners of West and South Africa, Caribbean, and African-American descent. Course includes performance projects. Repeatable May be repeated for a maximum of 6 hours credit when content varies. (Offered alternate years) **PREREQUISITE:** permission of instructor.

#### **THEA 4548 - Musical Theatre History**

**Credit Hours:** (3) **Description:** Survey of the shaping forces, history, art and craft of American musical. (Offered alternate years)

1338 **Credit Hours:** (3) **Description:** Shaping forces and theatrical forms from early civilization to present time; emphasis on Western culture.

# **THEA 4553 - Individual Studies Thtr**

**Credit Hours:** (1-3) **Description:** For advanced student who wishes to do concentrated study in specific area of theatre. Repeatable May be repeated for maximum of 9 hours credit. **PREREQUISITE:** permission of instructor.

# THEA 4554 - Visual History I

**Credit Hours:** (3) **Description:** Design aesthetics of selected historical periods from ancient times through Victorian era as applied to theatrical design. (Offered alternate years) **PREREQUISITE:** permission of instructor.

# **THEA 4555 - Scenic Technology**

**Credit Hours:** (3) **Description:** A course using traditional and contemporary materials and scenic techniques including rigging, metals and welding, wood working, and plastics. (Offered alternate years) **PREREQUISITE:** THEA 3511, or permission of instructor.

# THEA 4556 - Light & Sound Tech

**Credit Hours:** (3) **Description:** Study of technical principles that support areas of theatrical lighting design; instrumentation and equipment, electricity and electronics, control systems, operational and maintenance principles and procedures for stage electricians. (Offered alternate years)

# THEA 4557 - Costume Technology I

**Credit Hours:** (2) **Description:** Intermediate costume construction techniques employing both traditional and experimental methods for sewing; brings costume design from concept to reality. (Offered alternate years) **PREREQUISITE:** THEA 3562, or permission of instructor.

#### THEA 4558 - Visual History II

**Credit Hours:** (3) **Description:** Design aesthetics of selected historical periods from Victorian era through 20th century as applied to theatrical design. (Offered alternate years) **PREREQUISITE:** permission of instructor.

#### THEA 4561 - Scenic Design I

**Credit Hours:** (2) **Description:** The use of theatrical rendering as the primary communication tool between a director and designer. Topics include examination of performance spaces, rendering techniques and presentation practices. PREREQUISITE: THEA 3561 or permission of instructor. (Offered alternate years) **PREREQUISITE:** THEA 3561 or permission of instructor.

#### **THEA 4549 - Theatre History**

# THEA 4562 - Lighting Design I

**Credit Hours:** (2) **Description:** Investigation of art of lighting design; script analysis, design approaches and methodologies, procedures and practices for working designers, cue techniques, design styles and forms, and criticism of lighting design. Research project work and staged scenes required. (Offered alternate years) **PREREQUISITE:** THEA 4556, or permission of instructor.

# THEA 4563 - Costume Design I

**Credit Hours:** (2) **Description:** Exploration/application of aesthetic principles and practical production concerns of costume design; special consideration to interpretation of dramatic text through design and fabrication, employing a variety of rendering processes in the studio environment. Emphasis on professional practice for the entertainment industry, and portfolio development. (Offered alternate years) **PREREQUISITE:** Permission of the Instructor.

# THEA 4565 - Costume Design II

**Credit Hours:** (2) **Description:** An advanced course in costume design study with emphases on design process and executive expectations/solutions. Topics to include: Composition, Styling, Fit, Period Style, Fabrications and Creative Invention. Repeatable May be repeated up to 4 credits with permission of instructor. (Offered alternate years) **PREREQUISITE:** THEA 3562.

# THEA 4568 - Sound Design II

**Credit Hours:** (2) **Description:** Advanced investigation of the art of sound design; alternative creative design processes and aesthetics, advanced editing techniques. (Offered alternate years)

# **THEA 4571 - Playwriting**

**Credit Hours:** (3) **Description:** Theory and principles of writing plays for stage. Practice in writing either short or long play. Repeatable May be repeated for maximum of 9 hours credit. (Offered alternate years) **PREREQUISITE:** permission of instructor.

#### THEA 4572 - Costume Technology I

Credit Hours: (3)

**Description:** Basic studio in costume construction techniques employing both traditional and experimental mehtods. Topics could include: Basic pattern making and draping, corsetry, tailoring, theatrical hair & basic makeup technique, and millinery/crafts. Repeatable: May be repeated for a maximum of 6 credit hours. (Offered alternate years) PREREQUISITE: Permission of instructor.

# THEA 4573 - Costume Technology II

**Credit Hours:** (2) **Description:** Advanced studio in costume construction techniques employing both traditional and experimental mehtods. Topics could include: Advanced pattern making and draping, corsetry, tailoring, theatrical hair & advanced makeup technique, and millinery/crafts. Repeatable May be repeated for a maximum of 6 credit hours. (Offered alternate years) **PREREQUISITE:** Permission of instructor.

# THEA 4575 - Scenic Design II

**Credit Hours:** (2) **Description:** Scenic design will be explored through in depth exercises, specifically theatrical model building, that are intended to develop critical thinking, priority analysis, design skills and presentation technique. (Offered alternate years)

# THEA 4577 - Lighting Design II

**Credit Hours:** (2) **Description:** Advanced investigation of the art of lighting design; alternative design events, creative design processes, aesthetics and programming techniques. (Offered alternate years)

# **THEA 4578 - Projection Design & Control**

**Credit Hours:** (2) **Description:** Exploration of a variety of topics and tools as they relate to the use of digital media, video and projections in the live production environment. (Offered alternate years)

# **THEA 4582 - Script Interpretation**

**Credit Hours:** (3) **Description:** Exploration of the script as blueprint for realization of artistic stage image. Special attention given to plot, structure, character treatment, and language style as they relate to performance, direction, and scenography. **PREREQUISITE:** major or minor in Department of Theatre and Dance.

# **THEA 4591 - Professional Theatre Practice**

**Credit Hours:** (3) **Description:** Procedures and practices for career success in several aspects of professional theatre: job searching; interviewing; self-promotion; theatrical production management; grant writing.

#### **THEA 4592 - Theatre Architec/Facility Plan**

**Credit Hours:** (3) **Description:** Processes and techniques employed by theatre planners in design and construction/renovation of theatrical spaces and structures; survey of theatre forms, historical development of theatrical structures and spaces, programming methods and procedures, specification, renovation techniques, multi-use structure concepts, and consultation procedures and practices. (Offered alternate years) **PREREQUISITE:** permission of instructor.

# THEA 4596 - Sound Design I

**Credit Hours:** (2) **Description:** Investigation of the art of theatrical sound design; script analysis, creative design processes and aesthetics,

cue techniques, design styles and forms, procedures and practices for working designers and criticism of sound design. (Offered alternate years) **PREREQUISITE:** THEA 4556, or permission of instructor.

# THEA 4631 - Acting for Film and TV

**Credit Hours:** (3) **Description:** Educational experience for actor in media of film and television. (Offered alternate years) **PREREQUISITE:** permission of instructor.

### THEA 4982 - Honors Seminar

**Credit Hours:** (3) **Description:** Intensive study of particular problems in theatre and dance. Repeatable May be repeated for a maximum of 12 hours credit when topic varies. **PREREQUISITE:** permission department chair

#### **THEA 4999 - Senior Honors Thesis**

**Credit Hours:** (3) **Description:** Supervised independent research project. Open only to students enrolled in the Theatre and Dance Honors Program. Repeatable May be repeated for a maximum of 6 hours credit. **PREREQUISITE:** permission department chair.

# **UNIV 1005 - Directed Study**

**Credit Hours:** (1-3) **Description:** Directed study at introductory level. Student may seek permission to study under faculty direction in an area not routinely taught. Repeatable May be repeated for maximum of 6 hours credit.

# UNIV 1500 - Career Skill Build/Workforce

**Credit Hours:** (3) **Description:** Basic skill and knowledge needed for the development of personal career goals, communication skills, teamwork, and employment success.

# UNIV 2100-2109 - Special Topics

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing.

#### **UNIV 2110 - Field Experience**

**Credit Hours:** (1-6) **Description:** Supervised on-site training in basic skills. Repeatable May be repeated for a maximum of 6 hours credit. (S/U)

#### **UNIV 2200 - Introduction to Student Development**

**Credit Hours:** (3) **Description:** This course provides an introduction to the foundational elements of student development theory through the lens of intrapersonal and organizational leadership. Students will develop an awareness of "self" as a leader in relation to others within the collegiate setting and life practice using reflection and theoretical application inside the classroom and through campus and community

engagement. Specific models that will be examined include Chickering's Theory of Identity Development, Schlossberg's Transition Theory, Leadership Identity Development Model, Relational Leadership, Situational Leadership, Perry's Theory of Intellectual and Ethical Devleopment, Kohlberg's Theory of Moral Development, and Kolb's Theory of Experiential Learning in addition to identity-specific student development models.

# UNIV 2555 - Intro Creativity/Innov/Design

**Credit Hours:** (3) **Description:** In this intensive 3-credit course, students will be introduced to leading-edge concepts related to creativity, innovation, and design, and will apply these concepts to a real-world design challenge resulting in an innovative solution, but more importantly, it is where students learn that failure is the birthplace of brilliance. The centerpiece of the course is an intensive, field-based, hands-on workshop where all concepts are applied.

# UNIV 2860 - Cultural Confrontations H/P

**Credit Hours:** (3) **Description:** Interdisciplinary examination of causes and effects of conflicts between and within cultures. Examines notion of cultural unity, issues of cultural identify, and categories used to construct cultural positions; European, African, Asian, and Native-American cultures studied in order to assess historical and philosophical viewpoints that influence understandings of contemporary society.

# **UNIV 2900 - Experiential Learning Interm**

**Credit Hours:** (1-30) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Upper/lower-division credit determined by faculty assessor.

# UNIV 3100 - Seminar in Emergency Management

**Credit Hours:** (3) **Description:** Synthesizing and integrating the various elements of emergency management. *Cross listing:* (Same as EMGT 3100, ESCI 3100, PADM 3100)

# UNIV 3303 - Phil/Theory of Leadership

**Credit Hours:** (3) **Description:** Formal study of leadership models with opportunity to practice leadership among peers in the ongoing operations of student organizations.

# UNIV 3304 - Leadership & Social Change

**Credit Hours:** (3) **Description:** Importance of being an agent of change in communities, personal concepts of leadership, leaving a legacy for those who come after.

# **UNIV 3305 - Strengths Based Leadership**

**Credit Hours:** (3) **Description:** This experiential learning course will focus on interpersonal leadership theories, practice, skill development,

and application in supervised collegiate leadership setting, with an indepth emphasis on leadership as a behavior (i.e., self in relation to others). This section provides Advanced Student Organization Leaders direct training and preparation to lead their student organization. The purpose of this course is to prepare student organization leaders with the ability to be successful in their role. The course begins the process of exploring leadership and gaining skills to lead their organization. The course will be collaborative in nature, allowing students to build relationships with one another. By utilizing Strengths Based Leadership, The Student Leadership Challenge, to develop each student into the best possible student organization leader they can be. By utilizing course content and resources across campus for student organizations, the students will gain a full experience to develop themselves and the organization they are a member of.

#### UNIV 3522 - American Cinema \*\*

**Credit Hours:** (3) **Description:** Overview of American film history from silent cinema to the present. Considers the place of Hollywood film in American popular culture, the relation of movie technology to film art, and seeks to develop cinematic literacy and the ability to think critically about popular culture.

#### UNIV 3526 - War & American Society \*\*

**Credit Hours:** (3) **Description:** Interdisciplinary examination of the concept and effects of war from historical, literary, artistic and philosophical perspectives. Focus on the various ways in which America has dealt with war, from the Revolutionary War to the recent Gulf Conflict, and on the changes in American society that have resulted.

#### UNIV 3531 - Am Exp: Image/Narrative \*\*

**Credit Hours:** (3) **Description:** Organized around "images" and "narratives"; utilizes a variety of cultural materials to enhance appreciation of the peoples and experiences that define the term "American."

#### UNIV 3534 - Theatre & Therapy

**Credit Hours:** (3) **Description:** Traces the therapeutic functions of theater from the ancient practice of shamanistic rituals up to the contemporary applications of psychodrama and drama therapy. Considers the meaning of drama and play in a evolving culture. Practical experience in the therapeutic uses of theater through a series of workshops.

### UNIV 3535 - Family Communication\*\*

**Credit Hours:** (3) **Description:** Course offered on campus and online. Provides a framework and perspective for analyzing the family as a communication system. It examines the ways in which members of family systems interact in order to develop, sustain and manage their relationships in an era when family issues are at the forefront of national concerns, particularly in governmental, educational and religious arenas. **Credit Hours:** (3) **Description:** An analysis of ethical decisions and dilemmas of professional practice. A study of elementary principles of moral philosophy and applying those principles to professional decisions. Learning how to tolerate disagreement, developing respect for ethnic and gender diversity, and gaining a sense of moral responsibility in your professional practice.

#### UNIV 3542 - Baseball in America \*\*

**Credit Hours:** (3) **Description:** Cultural aspects of baseball in America and impact it has had on society; early history of the game; formation of various leagues; The World Series; racism in the game; game's role in literature, radio, and television.

#### UNIV 3543 - College Football in America \*\*

**Credit Hours:** (3) **Description:** This course will introduce you to the cultural aspects of college football in America and the impact it has had on society. We will discuss the early history of the game, the formation of the major conferences, the playoff system, formation of the NCAA, integration of the sport, the Heisman Trophy, along with its economic impact on America. College football's bowl season means big money for the local economies of its host cities – especially those that host one of the marquee "New Year's Six" playoff matchups, according to a recent study.

#### **UNIV 3550 - Clash of Cultures**

**Credit Hours:** (3) **Description:** Multi-leveled, complex, and consequential clashes that have shaped American culture and much of the modern world.

# UNIV 3565 - Comparative Christianity\*\*

**Credit Hours:** (3) **Description:** Commonality in Christianity; major turning points in Christian history; the tradition's variety of subgroups, starting with the three great groupings: Eastern Christianity, Roman Christianity, and Protestant Christianity; examination of future of Christianity.

#### UNIV 3580 - Hebrew and Greek Legacy\*\*

**Credit Hours:** (3) **Description:** Interdisciplinary examination of salient ideas, values, and traditions of ancient Hebraic and Greek cultures, with emphasis on those ideas and values that have most significantly influenced the modern world; understanding of ideas and values enhanced through comparison with selected non-Western traditions. **PREREQUISITE:** ENGL 1010 and ENGL 1020. **[G]** 

#### UNIV 3581 - Faith/Reason/Imagination\*\*

**Credit Hours:** (3) **Description:** Interdisciplinary examination of religious, rationalist, and aesthetic viewpoints as distinctive ways of understanding what is fundamental to human experience. Exploration

of historical development of each of these modes of understanding and examination of tensions that exist among them in modern world. **PREREQUISITE:** ENGL 1010 and ENGL 1020. **[G]** 

# UNIV 3585 - Ancient Empires & Contemporary Interpretations of the Old Testament \*\*

**Credit Hours:** (3) **Description:** Thematic, interdisciplinary approach to the academic study of the Old Testament, including some of the complex historical, literary, and cultural contexts of the ancient production and contemporary interpretation of these texts.

# **UNIV 3590 - New Testament**

**Credit Hours:** (3) **Description:** Main events, background, characters and teaching of the New Testament and how it relates to the Old Testament and to today.

# UNIV 3592 - Religious Perspectives on Death and Afterlife

**Credit Hours:** (3) **Description:** This course explores religious rituals and beliefs about death, burial, and afterlife from various global, historical, and social perspectives. **PREREQUISITE:** ENGL 1010 and ENGL 1020.

#### UNIV 3700-3739 - Special Topics

# **UNIV 3740 - Critical Thinking/Professions**

**Credit Hours:** (3) **Description:** Topics include the development of personal and professional life skills; effective communication skills, interview skills, cover letter and resume preparation; proper business etiquette, financial planning; professional working environment.

# UNIV 3900 - Experiential Learning Adv

**Credit Hours:** (1-30) **Description:** A systematic process for evaluating and credentialing learning gained in a variety of contexts. Upper/lower-division credit determined by faculty assessor.

#### UNIV 4110 - Internship\*\*

**Credit Hours:** (3-6) **Description:** Supervised training in work related to student's educational objectives. **PREREQUISITE:** approval of Outof-Class Learning and Baccalaureate Contracts. (S/U).

# UNIV 4300 - Leadership Training for Student Development

**Credit Hours:** (3) **Description:** The primary purpose of the course is to facilitate learning opportunities and experiences which will provide students with the knowledge, attitudes, and skills necessary to become effective student leaders. This class will help students gain a better

# UNIV 4310 - Leadership Training in Student Recruitment

**Credit Hours:** (3) **Description:** The primary puppose of the course is to facilitate learning opportunities and experiences which will provide students with the knowledge, attitudes, and skills necessary to become effective leaders. This class will help you gain a better understanding of the university experience while also learning about the available resources and services offered here at UofM. In addition, you will learn a great deal about yourself, your peers, and your instructors throughout the semester.

# UNIV 4380 - Independent Study

**Credit Hours:** (1-3) **Description:** Directed individual study or research. Students who have identified area of study pertinent to their coordinated study program, that is not routinely taught, may pursue the study under direction of faculty member. Repeatable May be repeated for a maximum of 6 hours credit.

# UNIV 4506 - The Chinese

**Credit Hours:** (3) **Description:** Provides an understanding of the people, history, culture, and government of a civilization more than 5,000 years old. Shows the influence ancient Chinese medicine, art and religion has had on the contemporary world and illustrates the way in which China attempts to balance economical and political development with ancient customs, rituals, and beliefs. Also considers the role which China plays in the global economy - now and in the future.

#### **UNIV 4511 - Holocaust Studies**

**Credit Hours:** (3) **Description:** Synthesizing knowledge and methodologies from several disciplines; contexts and implications of the Holocaust; encompass periods before, during, and after the event to explore questions of human values and responsibility; research paper, journal, writing for oral presentation and essay exam. Intended for seniors. *Cross listing:* (Same as JDST 4511).

#### UNIV 4518 - Literature Of Americas \*\*

**Credit Hours:** (3) **Description:** Explores the diversity, similarities and universality of the central themes of Spanish- American and African-American fiction.

#### UNIV 4520 - Mind/Brain/Intelligence

**Credit Hours:** (3) **Description:** Interdisciplinary studies of cognition, behavior, emotion, intelligence, and brain mechanisms; synthesis of research contributions from cognitive science, neuroscience, artificial intelligence, and philosophy. *Cross listing:* (Same as PSYC 4305).

# UNIV 4527 - The Developing Adult \*\*

**Credit Hours:** (3) **Description:** Early, middle, and late adulthood; social relationships; retirement issues and options; choice in living arrangements; end-of-life concerns.

# **UNIV 4700 - Czech Culture and History**

**Credit Hours:** (3) **Description:** Study Abroad to the Czech Republic; upon completion of course, students will receive a Teaching English as a Foreign Language certificate.

### UNIV 4708 - Business Intelligence\*\*

**Credit Hours:** (3) **Description:** Data warehousing, data mining, text and web mining, and reality mining.

# UNIV 4810 - Software Project Management\*\*

**Credit Hours:** (3) **Description:** This course focuses on the analysis, design, and implementation of software systems. Other concepts integrated in the course include project metrics, code inspections, testing and maintenance strategies, risk management and professional and ethical responsibilities. This course is intended for students in the BPS Information Technology concentration.

# UNIV 4830 - Israeli/Arab Conflict

**Credit Hours:** (3) **Description:** Historical, political, cultural dimensions of tensions that have existed between Israelis and Arabs since the founding of the State of Israel with attention to current situation *Cross listing:* (Same as JDST 4830).

#### UNIV 4995 - Senior Project\*\*

**Credit Hours:** (3) **Description:** Academic research or other creative activity resulting in tangible project to demonstrate synthesis of student's Coordinated Study. **PREREQUISITE:** senior status.

#### **UNHP 1100 - The Honors Forum**

**Credit Hours:** (1) **Description:** Weekly meeting of Honors students. Discussion led by faculty and/or students on various topics. Honors credit requires grade of B" (3.0). May not be repeated to improve former grade."

High Impact Practice Code: Service Learning, Research

#### **UNHP 1101 - Humanities/Global Challenge**

**Credit Hours:** (3) **Description:** An interdisciplinary investigation of current global controversies and issues, integrating literature, art, and other forms of cultural expression. Honors credit requires grade of B" (3.0). Substitutes for a Humanities/Fine Arts General Education requirement for Honors students. "

# UNHP 1102 - Social Scien/Global Challenge

1343 **Credit Hours:** (3) **Description:** An interdisciplinary exploration of economic, human, cultural, and political dimensions of globalization. Honors credit requires grade of B" (3.0). Substitutes for a Behavioral/Social Science General Education requirement for Honors students. "

# **UNHP 3001 - Literacy Tutoring**

**Credit Hours:** (3) **Description:** (Same as RDNG 3001). Designed for students to teach literacy to school-aged children in clinical K-12 schools or non-profit settings. May be repeated for a maximum of 9 hours credit. May not be repeated to improve grade. **PREREQUISITE:** PREREQUISITE: restricted to University Honors Students or Education Students seeking licensure, and permission of instructor.

# UNHP 3010-3015 - Special Topics in University Honors

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing.

#### **UNHP 3114 - Honors Thesis Workshop**

**Credit Hours:** (1) **Description:** Series of weekly meetings to provide prospective Honors thesis writers with the background and resources necessary to produce quality independent research. **PREREQUISITE:** PREREQUISITE: third-year standing in Honors, or permission of the Director of the University Honors Program. (S/U).

# UNHP 3265-3269 - Special Topics in University Honors

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing.

# **UNHP 3407 - Evolutionary Perspective**

**Credit Hours:** (3) **Description:** Principles of anthropology, biology, chemistry, and geology as applied to evolutionary thoughts and processes. Three lecture hours per week. **PREREQUISITE:** PREREQUISITE: 8 semester hours of Natural Science courses.

# UNHP 4150 - Econ of Social Issues

**Credit Hours:** (3) **Description:** Selected contemporary issues to be approached in terms of demographic, social, economic, political, cultural, and historical dimensions; perspectives from social sciences and humanities; emphasis on social policies as problem solving strategies. Varied topics based on broad thematic areas such as public education; race and ethnic relations; criminal justice system; religion in public life; role of media in political discussion. May be repeated for credit as topic varies. May not be repeated to improve a former grade.

# **UNHP 4900 - Adv Honors Projects**

**Credit Hours:** (1) **Description:** Designed for individuals or small groups of students working collaboratively. Students encouraged to design own projects. May include reading, research, discussion group, or experiential projects. Advanced projects assume sufficient background for advanced level. Credit varies according to project. Application to department and college honors programs at their discretion. Letter grade unless student application for credit/no credit approved before registration. May be repeated for a maximum of 9 hours credit. May not be repeated to improve a former grade.

# UNHP 4901-4909 - Special Topics in University Honors

**Credit Hours:** (3) **Description:** Topics vary by semester, see online class schedule listing

# **UNHP 4999 - Honors Thesis**

**Credit Hours:** (3) **Description:** In conjunction with a faculty mentor, most often from student's major department. Guidelines for students and faculty and applications available from Honors Office. Preliminary applications should be completed two semesters in advance. Formal applications due before final examinations week in semester preceding semester in which credit sought. Letter grade unless student application for credit/no credit approved before registration. Honors credit requires grade of B" (3.0). May not be repeated to improve a former grade."

# WMST 2100 - Intr/Women/Gender Study \*\*

**Credit Hours:** (3) **Description:** Exploration of racially diverse women's experience, focus on contemporary gender issues; overview of different disciplinary and theoretical approaches.

#### WMST 3000 - Multicultural Women's Lit

**Credit Hours:** (3) **Description:** Exploration of texts of women writers across a multicultural schema, with particular attention to African American, African, Chicana, and Arab women writers.

#### WMST 4340 - Independent Study

**Credit Hours:** (3) **Description:** Readings and writing assignments designed to further the student's understanding of a specialized area within women's studies.

# WMST 4380-4399 - Special Topics in Women's and Gender Studies

**Credit Hours:** (3) **Description:** Topics are varied and in online class listings.

#### ACCT 1010 - Principles of Accounting I \*\*

Credit Hours: (3) PREREQUISITE: MATH 1730 MATH 1130 MATH 1710

#### 1344 ACCT 1020 - Principles of Accounting II\*\*

**Credit Hours:** (3) **PREREQUISITE:** ACC1104 ACCT 1010 ACCT 2010

ACCT 2341 - Cost Accounting\*\*

Credit Hours: (3)

#### AGRI 1010 - Introduction to Agribusiness \*\*

**Credit Hours:** (3)

AGRI 1020 - Into to Animal Science\*\*

Credit Hours: (3)

AGRI 1030 - Introduction to Plant Science\*\*

Credit Hours: (3)

AGRI 1050 - Into to Soil Science\*\*

Credit Hours: (4)

ALHS 1000 - Careers in Healthcare\*\*

Credit Hours: (3)

ANTH 1230 - Intro to Cultural Anthropology\*\*

Credit Hours: (3)

#### ANTH 1430 - Prehistoric Archaeology\*\*

Credit Hours: (3)

#### ART 1030 - Intro to Art\*\*

**Credit Hours:** (3) **Description:** Fundamental principles of artistic expression as basis for understanding Western and nonWestern traditions in the visual arts. **[G]** 

#### ARTH 2010 - Survey of Art History I\*\*

Credit Hours: (3)

ARTH 2020 - Survey of Art History II\*\*

Credit Hours: (3)

#### ASTR 1010 - Solar System Astronomy\*\*

Credit Hours: (4)

BIOL 1010 - Intro to Biology I & Lab\*\*

**Credit Hours:** (4)

BIOL 1020 - Intro to Biology II & Lab\*\*

Credit Hours: (4)

BIOL 1430 - Nutrition \*\*

Credit Hours: (3)

**BIOL 1510 - Environmental Science I\*\*** 

Credit Hours: (4)

**BIOL 1520 - Environmental Science II\*\*** 

**Credit Hours:** (4)

BIOL 2010 - Anatomy/Physiology I & Lab\*\*

Credit Hours: (4)

BIOL 2020 - Anatomy/Physiology II & Lab\*\*

Credit Hours: (4)

BIOL 2230 - Intro to Microbiology w/Lab \*\*

Credit Hours: (4)

BIOL 3100 - Genetics\*\*

Credit Hours: (3)

BIOL 3120 - General Ecology\*\*

**Credit Hours:** (3)

BMGT 3600 - International Mgmt\*\*

Credit Hours: (3)

BMGT 3630 - Human Resource Mgmt\*\*

Credit Hours: (3)

**BUSN 1300 - Personal Finance\*\*** 

**Credit Hours:** (3)

1345 BUSN 1301 - Legal Issues for the Web\*\*

Credit Hours: (3)

**BUSN 1305 - Introduction to Business\*\*** 

Credit Hours: (3)

**BUSN 1310 - Business Communications\*\*** 

Credit Hours: (3)

**BUSN 1340 - Small Business Management\*\*** 

Credit Hours: (3)

BUSN 1350 - Sales and Service\*\*

Credit Hours: (3)

**BUSN 1370 - Spreadsheet Applications\*\*** 

Credit Hours: (3)

**BUSN 2320 - Business Finance\*\*** 

Credit Hours: (3)

**BUSN 2350 - Organizational Behavior\*\*** 

Credit Hours: (3)

**BUSN 2360 - International Business\*\*** 

```
Credit Hours: (3)
```

BUSN 2370 - Legal Environment of Business\*\*

**Credit Hours:** (3)

**BUSN 2380 - Principles of Marketing\*\*** 

Credit Hours: (3)

BUSN 2450 - E Commerce\*\*

Credit Hours: (3)

CHEM 1010 - Intro to Chemistry I & Lab\*\*

Credit Hours: (4)

### 1346 CITC 1320 - A+ Hardware & Software\*\* CHEM 1020 - Intro to Chemistry II & Lab\*\* Credit Hours: (3) Credit Hours: (4) CHEM 1040 - Intro to General Chemistry\*\* CITC 1321 - A+ Hardware\*\* Credit Hours: (3) Credit Hours: (3) CHEM 4300 - General Biochemistry\*\* CITC 1322 - A+ Software Cert Training\*\* Credit Hours: (3) Credit Hours: (3) CISP 1010 - Computer Science I\*\* CITC 1330 - Microsoft Dsktp Op Systems\*\* **Credit Hours:** (3) Credit Hours: (3) CITC 1333 - Linux LPIC-1\*\* CITC 1300 - Beginning HTML & CSS\*\* Credit Hours: (3) Credit Hours: (3) CITC 1302 - Introduction Networking\*\* CITC 1360 - Computer Graphics\*\* Credit Hours: (3) Credit Hours: (3) CITC 1303 - Database Concepts\*\* CITC 2326 - Network Security\*\* **Credit Hours:** (3) Credit Hours: (3) CITC 1310 - Programming I\*\* CITC 2399 - CO-OP/Intern Comp Info Tech\*\* Credit Hours: (3) Credit Hours: (3) CITC 1311 - Programming II\*\* CJA 3230 - Police Org/Admin\*\* **Credit Hours:** (3) Credit Hours: (3) CITC 1312 - Intro .NET Programming\*\* COBH 4707 - International Health/Prob/Iss\*\* Credit Hours: (3) Credit Hours: (3) COL 101 - Orientation/College Exp\*\* CITC 1313 - .NET Programming\*\* Credit Hours: (3) Credit Hours: (3) CITC 1318 - Data Structures\*\* COM 1010 - Basic Web Design\*\* **Credit Hours:** (3) Credit Hours: (3) CITC 1319 - Intro Programming Mobile Apps\*\* COM 1020 - Basic Web Graphics\*\* Credit Hours: (3) Credit Hours: (3)

# COMM 1010 - Survey of Mass Communication\*\*

Credit Hours: (3)

COMM 2025 - Fundamentals of Communication\*\*

Credit Hours: (3)

COMM 2075 - Organizational Communication\*\*

**Credit Hours:** (3)

COMM 3003 - Television and Culture\*\*

Credit Hours: (3)

COMM 3010 - Integrated Corp Comm\*\*

Credit Hours: (3)

COMM 3560 - Intercultural Communtn\*\*

**Credit Hours:** (3)

COMM 4410 - Conflict Resolution and Negot\*\*

**Credit Hours:** (3)

COMM 4910 - Public Relatns Campaign\*\*

**Credit Hours:** (3)

COMM 7110 - Leadership/Communicatn\*\*

**Credit Hours:** (3)

COMP 3050 - Programming Languages\*\*

**Credit Hours:** (3)

CRMJ 1010 - Intro to Criminal Justice\*\*

**Credit Hours:** (3)

CRMJ 1020 - Introduction to Legal Process\*\*

**Credit Hours:** (3)

CRMJ 1301 - Correctional Counseling\*\*

Credit Hours: (3)

CRMJ 1311 - Criminal Law\*\*

**Credit Hours:** (3) **Description:** Successful ACT or placement test scores

CRMJ 1322 - Plice Organization & Admin\*\*

Credit Hours: (3)

CRMJ 1330 - Criminal Evidence & Procedures\*\*

**Credit Hours:** (3) **Description:** Successful ACT or placement test scores.

CRMJ 1340 - Criminal Investigation\*\*

Credit Hours: (3)

CRMJ 1350 - Criminal Justice Career Plan\*\*

Credit Hours: (3)

CRMJ 1355 - Understanding Terrorism\*\*

Credit Hours: (3)

CRMJ 1360 - Intro Crime Scene Investigatn\*\*

Credit Hours: (3)

CRMJ 2010 - Intro to Law Enforcement\*\*

**Credit Hours:** (3)

CRMJ 2020 - Intro to Corrections\*\*

Credit Hours: (3)

CRMJ 2050 - Introduction to Cyber Security\*\*

Credit Hours: (3)

CRMJ 2311 - Juvenile Justice\*\*

Credit Hours: (3)

CRMJ 2312 - Criminology\*\*

Credit Hours: (3) PREREQUISITE: PREREQUISITE: CRMJ 1010.

CRMJ 2332 - Drug Identification & Effects\*\*

# CRMJ 2340 - Investigative Report Writing\*\*

Credit Hours: (3)

# CRMJ 2359 - Correctional Security Admin\*\*

Credit Hours: (3)

CRMJ 2390 - Probation and Parole\*\*

**Credit Hours:** (3)

CRMJ 3640 - Cybercrime\*\*

Credit Hours: (3)

CRMJ 4010 - Organized Crime\*\*

Credit Hours: (3)

# CRMJ 4515 - Sexual Offenses and Offenders\*\*

**Credit Hours:** (3)

# CRMJ 4520 - Patterns of Domestic Abuse\*\*

**Credit Hours:** (3) **Description:** This course investigates all forms of domestic violence from a sociological perspective including theoretical explanations, prevalence, risk factors, dynamics of prevention and intervention. It will focus on forms of violence related to the social institution of the family. Specifically, we will focus on the history of intimate partner abuse, child abuse, elder abuse, and related topics. This course revolves around three themes: 1) gaining knowledge and insight about family violence, 2) understanding the social context of family violence, 3) exploring and developing one's personal philosophy about family violence and related issues. This class will combine readings, discussions, active-learning exercises, and quizzes. **Prerequisites:** CRMJ 1010

# CRMJ 4530 - Sociology of Murder\*\*

**Credit Hours:** (3) **Description:** This course provides an analytical study of murder and violence in the United States. As such, course topics include: different types of homicide, offender characteristics, etiological considerations of becoming an offender or victim, the role of social profiling in the investigation of various types of murder, theoretical approaches to the study of murder, and patterns and sources of violence. Taking into account the grisly topic, students that are disturbed by particularly heinous crimes should avoid enrolling in this course. **Prerequisites:** CRMJ 1010 – Introduction to Criminal Justice

# CSCI 3222 - Database Mgmt System\*\*

**Credit Hours:** (3)

#### 1348 CSCI 4017 - Intro to Information Assurance\*\*

**Credit Hours:** (3)

ECED 1310 - Intro to Early Childhood Ed\*\*

Credit Hours: (3)

ECED 2310 - Safe/Healthy Learning Environ\*\*

Credit Hours: (3)

ECED 2312 - Administration/Child Care Cent\*\*

Credit Hours: (3)

ECED 2315 - Early Childhood Curriculum\*\*

Credit Hours: (3)

ECED 2320 - Infant/Toddler Child Develop\*\*

Credit Hours: (3)

ECED 2330 - Infant/Toddler Care\*\*

Credit Hours: (3)

ECED 2340 - Family Dynamics/Comm Involv\*\*

Credit Hours: (3)

ECED 2360 - Development/Exceptional Child\*\*

Credit Hours: (3)

ECED 2370 - Developmental Assess Methods\*\*

Credit Hours: (3) PREREQUISITE: ECED 2320

ECED 2380 - Language/Literacy/Early Child\*\*

Credit Hours: (3)

ECED 2385 - Math/Science/Early Childhood\*\*

Credit Hours: (3) PREREQUISITE: ECED 2315

ECED 2390 - Creative Development\*\*

Credit Hours: (3)

# ECON (TNe) 2010 - Intro to Macroeconomics\*\*

**Credit Hours:** (3) **Former:** (2110) **Description:** Nature and functions of the national economy in a global context. Includes consumption and investment behavior, national income and product determination, fiscal and monetary policy, and international trade. **[G]** 

### EDAD 7050 - Educational Law\*\*

Credit Hours: (3)

EDCI 4900 - Multicultural Education\*\*

**Credit Hours:** (3)

EDPY 207 - Educational Psychology\*\*

Credit Hours: (3)

EDU 201 - Foundations of Education\*\*

Credit Hours: (3)

EDU 1100 - Technology for Teachers\*\*

Credit Hours: (3)

EDU 1120 - Intro to Teaching\*\*

Credit Hours: (3)

EDU 2050 - Classroom Management\*\*

Credit Hours: (3)

EDUC 2120 - Intro to Special Education\*\*

**Credit Hours:** (3)

ELED 4260 - Teach/Learn/Internet\*\*

**Credit Hours:** (3)

ENGL 2010 - Intro to Literature I: Fiction\*\*

Credit Hours: (3)

ENGL 2030 - Experience of Literature\*\*

Credit Hours: (3)

ENGL 2035 - Introduction to Fiction\*\*

Credit Hours: (3)

ENGL 2110 - American Literature I\*\*

Credit Hours: (3)

ENGL 2116 - Writing for the Web\*\*

Credit Hours: (3)

ENGL 2120 - American Literature II\*\*

 $\label{eq:credit Hours: (3)} \textbf{Credit Hours: (3)}$ 

ENGL 2210 - English Literature I\*\*

Credit Hours: (3)

ENGL 2220 - English Literature II\*\*

Credit Hours: (3)

ENGL 2300 - Creative Writing\*\*

Credit Hours: (3)

ENGL 2310 - World Literature to 1650\*\*

Credit Hours: (3) PREREQUISITE: ENGL 1010 ENGL 1020

ENGL 2320 - World Lit Since 1650\*\*

Credit Hours: (3)

ENGL 2410 - Western World Lit I\*\*

Credit Hours: (3)

ENGL 2420 - Western World Lit II\*\*

**Credit Hours:** (3)

ENGL 2530 - African American Literature\*\*

Credit Hours: (3)

ENGL 2630 - Literature for Children\*\*

**Credit Hours:** (3)

ENGL 3134 - Computer/Writing/Lit\*\*

#### ENGL 3250 - Professional Comm\*\*

Credit Hours: (3)

ENGL 3290 - Intro to Film\*\*

Credit Hours: (3) PREREQUISITE: ENGL 1020

ENGL 3410 - Classic Mythology\*\*

Credit Hours: (3)

ENGL 3730 - 20th Century Women Writers\*\*

Credit Hours: (3)

ENGL 4100 - Writing Internet & Elect Media\*\*

Credit Hours: (3)

ENGL 4680 - Continental Literature\*\*

**Credit Hours:** (3)

ENGL 4700 - Non Western Literature\*\*

**Credit Hours:** (3)

ENTC 3030 - Technical Communication\*\*

Credit Hours: (3)

ESC 1110 - Intro to Env Studies I\*\*

**Credit Hours:** (4)

ESC 1120 - Intro to Env Studies II\*\*

**Credit Hours:** (4)

ET 3910 - Intro to Operations Management\*\*

**Credit Hours:** (3)

GEOG 1012 - Cultural Geography\*\*

**Credit Hours:** (3)

GEOG 2010 - World Regional Geography\*\*

Credit Hours: (3)

```
GEOG 3710 - Geog of United States**
```

1350

Credit Hours: (3)

GEOL 1030 - Geology with Lab\*\*

Credit Hours: (4)

HETH 4212 - Trends/Issues in Healthcare\*\*

Credit Hours: (3)

HIST 220 - African American History\*\*

Credit Hours: (3)

HIST 1120 - Survey World History II\*\*

Credit Hours: (3)

HIST 2010 - US History I\*\*

Credit Hours: (3)

HIST 4685 - Emergence/Modern America\*\*

Credit Hours: (3)

HIT 1010 - Health Information Tech\*\*

Credit Hours: (3)

HIT 1011 - Introduction to HIT\*\*

Credit Hours: (3)

HIT 1111 - Legal Aspects/Health Inform\*\*

**Credit Hours:** (3)

HIT 1131 - ICD-10-CM Coding System\*\*

Credit Hours: (3)

HIT 1140 - Computer App/Hith Info

Credit Hours: (3)

HPSS 3550 - Principle/Sport Fitness\*\*

Credit Hours: (3)

# HSC 190 - Intro Human Pathophys\*\*

Credit Hours: (3)

HTL 110 - Intro to Hospitality Industry\*\*

Credit Hours: (3)

HUM 1010 - Intro/Humanities I\*\*

Credit Hours: (3)

HUM 1020 - Intro to Humanities II\*\*

Credit Hours: (3)

**INFS 1010 - Computer Applications\*\*** 

Credit Hours: (3)

INFS 3700 - Systems Analysis and Design\*\*

Credit Hours: (3)

**INFS 4900 - Business Data Communications\*\*** 

**Credit Hours:** (3)

IST 2630 - Web Design\*\*

Credit Hours: (3)

JOUR 3400 - Survey of Public Relations\*\*

Credit Hours: (3)

JOUR 3409 - Public Relations Case Studies\*\*

**Credit Hours:** (3)

JOUR 3421 - Public Relations Writing\*\*

**Credit Hours:** (3)

JOUR 4250 - Mass Media Law\*\*

**Credit Hours:** (3)

JOUR 4410 - Public Relations Research\*\*

Credit Hours: (3)

# JOUR 4712 - Media and Cultures\*\*

**Credit Hours:** (3) **Description:** Designed for the professional communicator who needs to understand different cultures, both foreign and domestic; intercultural communication, comparison of cultural values and behaviors, the nature of news in different cultures, the international flow of news, growth and impact of global journalism, television, advertising, and public relations.

# LDSP 3000 - Leadership Development\*\*

**Credit Hours:** (3)

MATH 1005 - Algebra Essentials\*\*

Credit Hours: (3)

MATH 1010 - Mathematics for Liberal Arts\*\*

Credit Hours: (3)

MATH 1130 - College Algebra\*\*

Credit Hours: (3)

MATH 1630 - Finite Mathematics\*\*

Credit Hours: (3)

MATH 1710 - Precalculus I\*\*

Credit Hours: (3)

MATH 2010 - Intro Linear Algebra\*\*

Credit Hours: (3)

MATH 2050 - Calculus Based Prob/Stats\*\*

Credit Hours: (3)

MATH 3810 - College Geometry\*\*

Credit Hours: (3)

MDT 2100 - Photoshop Essentials\*\*

Credit Hours: (3)

MGMT 3030 - Mgmt/Service Organizatn\*\*

Credit Hours: (3)

# MGMT 3220 - Mgmt of Info Systems\*\*

Credit Hours: (3)

# MGMT 3610 - Princ Mgmt/Organ Behav\*\*

Credit Hours: (3)

MGMT 4800 - Corporate Etiquette\*\*

**Credit Hours:** (3)

MUS 1002 - Fundamentals of Music Theory\*\*

Credit Hours: (3)

MUS 1030 - Introduction to Music\*\*

**Credit Hours:** (3) **Description:** Music of various Western and non-Western cultures and historical periods, including the creative process, the formal elements of music and musical styles, genres, and media. Attendance at some concerts required. NOTE: May not be used to satisfy requirements for degrees in Music. **[G]** 

High Impact Practice Code: Learning Community

# NURS 4210 - Health Care Research\*\*

Credit Hours: (3)

NURS 4212 - Trends/Issues/Nurs/Healthcare\*\*

**Credit Hours:** (3)

# NURS 4213 - Community Health Nursing\*\*

Credit Hours: (3)

**ORCO 3240 - Organizational Comm\*\*** 

Credit Hours: (3) PREREQUISITE: ENGL1020

# PADM 4226 - Intro Nonprofit Organizations\*\*

Credit Hours: (3)

PBRL (TNe) 3400 - Introduction Public Relations\*\*

Credit Hours: (3)

PHED 1140 - Walking for Fitness

Credit Hours: (2)

PHIL 121 - Elementary Ethics\*\*

Credit Hours: (3)

PHIL 201 - Intro to World Religions

Credit Hours: (3)

PHIL 1030 - Intro to Philosophy\*\*

**Credit Hours:** (3)

PHIL 1040 - Introduction to Ethics\*\*

Credit Hours: (3)

PHIL 2200 - Intro to World Religions\*\*

Credit Hours: (3)

PHIL 2430 - Philosophy of Religion\*\*

Credit Hours: (3)

PHYS 1030 - Concepts of Phys W/Lab\*\*

**Credit Hours:** (4)

PM 4120 - Organization Theory and Behav\*\*

Credit Hours: (3)

POLI 3620 - Comparative European Govt\*\*

Credit Hours: (3)

POLI 4230 - The Presidency\*\*

**Credit Hours:** (3)

POLI 4350 - International Law\*\*

Credit Hours: (3)

POLS 1010 - Intro to Political Science\*\*

**Credit Hours:** (3)

POLS 2010 - State and Local Government\*\*

POLS 2050 - Comparative World Politics\*\*

POLS 3010 - Comparative Politics\*\*

**Credit Hours:** (3)

PS 3510 - InternI Political Economy\*\*

Credit Hours: (3)

PSCI 1010 - Survey/Phys Sci & Lab\*\*

**Credit Hours:** (4)

PSCI 1020 - Survey/Physical Science II\*\*

Credit Hours: (4) PREREQUISITE: DSPM0850

PSY 3590 - Psyc of Personality\*\*

Credit Hours: (3) PREREQUISITE: PSYC1030

PSYC 215 - Child Growth/Development\*\*

**Credit Hours:** (3)

PSYC 223 - Psychology of Aging\*\*

Credit Hours: (3)

PSYC 2110 - Psychology of Adjustment\*\*

Credit Hours: (3) PREREQUISITE: PSYC 1030

PSYC 2120 - Social Psychology\*\*

Credit Hours: (3) PREREQUISITE: PSYC 1030

PSYC 2130 - Life Span Dev Psychology\*\*

**Credit Hours:** (3)

PTMA 3020 - Managing Information Tech\*\*

Credit Hours: (3)

PTMA 3500 - Perform/Prod Assessment\*\*

**Credit Hours:** (3)

SOAA 3350 - Social Statistics\*\*

Credit Hours: (3)

SOAA 3444 - Data Analysis\*\*

```
Credit Hours: (3)
```

SOC 3200 - Sociology of Sex and Gender\*\*

**Credit Hours:** (3)

SOC 3650 - Juvenile Delinquency\*\*

**Credit Hours:** (3)

SOC 3700 - Sociology Of Childhood\*\*

Credit Hours: (3) PREREQUISITE: SOCI1010 SOC1010

SOC 4330 - Population/Social Process\*\*

**Credit Hours:** (3)

SOC 4510 - Social Deviance\*\*

**Credit Hours:** (3)

SOC 4720 - Sociological Theory

Credit Hours: (3)

SOCI 217 - Sociology of Aging\*\*

**Credit Hours:** (3)

SOCI 1020 - Social Problems\*\*

**Credit Hours:** (3)

SOCI 1120 - Intro Cultural Anthropology\*\*

**Credit Hours:** (3)

SOCI 2010 - Marriage and Family\*\*

**Credit Hours:** (3)

SOCI 4510 - Intro to Social Research\*\*

Credit Hours: (3) PREREQUISITE: MATH 1530 SOCI 1010 SOCI 1010

SPAN 3550 - Latin America Country & People\*\*

**Credit Hours:** (3) **Description:** Does not fulfill any foreign language requirement at the University of Memphis.

# SPCH 1010 - Fundamentals of Speech Comm\*\*

Credit Hours: (3)

SW 3170 - Family Caregiving\*\*

Credit Hours: (3)

SW 3200 - Cultural Diversity\*\*

Credit Hours: (3)

# SWRK 245 - Introduction to Counseling

Credit Hours: (3)

**Description:** Comparative analysis of major theoretical approaches to counseling and psychotherapy practice; psychodynamic, behavioral, cognitive behavioral, gestalt, transactional analysis, rational- emotive therapy and systems theory.

# TEAE 4020 - Read Write Learn Methods ESL\*\*

Credit Hours: (3)

TEAE 4437 - Assessment for ESL\*\*

Credit Hours: (3)

**TEAE 4500 - Linguistics\*\*** 

Credit Hours: (3)

TEAE 4501 - Modern English Grammar\*\*

Credit Hours: (3)

TEAS 4006 - Assistive Technology\*\*

**Credit Hours:** (3)

TEAS 4011 - Assess/Infant/Toddlers\*\*

Credit Hours: (2)

TELC 2007 - Adolescent/Adult Learner\*\*

Credit Hours: (3)

TELC 2008 - Learning thru Assessment/Eval\*\* The online catalog can be access Credit Hours: (3)

TELC 2009 - Learn Envn School Set\*\*

Credit Hours: (3)

TELC 2010 - Survey of Excep and Diversity\*\*

Credit Hours: (3)

TELC 2011 - Teaching & Learning w/Tech Sch\*\*

Credit Hours: (3)

TELC 2012 - Agents/Change In School\*\*

Credit Hours: (3)

TELC 2014 - Learn Environ/Post Secd\*\*

Credit Hours: (3)

TELC 4001 - Adolescent Development\*\*

Credit Hours: (3)

TELC 4002 - Assessment/Evaluation\*\*

Credit Hours: (3)

**TELC 4003 - Managing Learning Environment\*\*** 

**Credit Hours:** (3)

**TELC 4004 - Survey Exceptional Children\*\*** 

Credit Hours: (3)

TELC 4006 - Teacher/Agent Of Change\*\*

Credit Hours: (3)

UNIV 3713 - Freedom, Openness, Internet\*\*

Credit Hours: (1)

UNIV 4706 - Managing Software Development\*\*

**Credit Hours:** (3) **Description:** The purpose in this course is to develop skills necessary to be an effective manager of an application software development team. Through this course, the student will become familiar with the process of managing the complete software development process in a business application context. Primary focus

will be on the planning and oversight skills associated with managing a team of application developers and the process of defining and completing application development projects. Emphasis will be placed on information-gathering, project design, budgeting, and ongoing oversight. In addition, the student will become familiar with the terminology and product knowledge associated with the complex enterprise wide software development efforts.

#### WEB 2120 - Audio/Video For Web\*\*

Credit Hours: (3)

WEB 2400 - Project Management/Web\*\*

Credit Hours: (3)

WEB 2811 - Adv Computer Graphics\*\*

**Credit Hours:** (3)

WEB 2812 - Adv Web Page/Site Desgn\*\*

**Credit Hours:** (3)

#### WEBT 1310 - Web Page Application\*\*

**Credit Hours:** (3) **Description:** Prior to taking this course, students should have a basic working knowledge of the Windows operating system, the Internet and Microsoft Front Page.

### WMST 2010 - Intro to Women's Studies\*\*

Credit Hours: (3)

# LBRY 4020 - Research and Information Literacy in Hospitality and Resort Management

**Credit Hours:** (3) **Description:** This course will introduce the varieties of research, writing, and formal and informal communication that characterize and represent the profession. Students will research topics related to professional interests, write reports, make in-class presentations, and respond to the work of classmates. Students are expected to be actively engaged in the learning and participate fully in each session. The instructional goal is to apply these skills and methods to individual, professional interests and career goals.

# **University Administration, Faculty and Staff**

Director, Office of Institutional Equity & Chief Compliance Officer

Executive Vice President for Research and Innovation Executive Vice President for University Relations

Executive Vice President for Academic Affairs and Provost Chief Economic Development and Government Relations Officer

Executive Vice President for Academic Affairs and Provost

Dean of the Fogelman College of Business and Economics

Executive Dean. UofM Global & Academic Innovation

Dean of the College of Communication and Fine Arts

Director of the Helen Hardin Honors College Dean of Students, Chief Health and Safety Officer

Associate Vice President, Educational Initiatives

Dean of the Cecil C. Humphreys School of Law

Dean of the Herff College of Engineering

Dean of the Loewenberg College of Nursing

Dean of the School of Communication Sciences and Disorders

Dean of the Kemmons Wilson School of Hospitality and Resort Management

Dean, UofM Lambuth; Chief Operating Officer, Lambuth and Millington Campuses

Vice President and Chief Financial Officer

Vice President for Student Academic Success

Chief Audit Executive, Internal Audit

Vice Provost for Enrollment Services

Dean of the College of Arts & Sciences

Dean of the College of Health Sciences

Dean of the School of Public Health

Dean of the College of Education

Dean of the Graduate School

Executive Director of University Libraries

# **University Administration**

Chief of Staff

Vice President for Physical Plant

Chief Advancement Officer

Chief Information Officer

University Counsel

Athletic Director

Chief of Staff

University Counsel

#### President

M. David Rudd

#### **President's Council**

Stephanie Beasley
Ron Brooks
Tiffany Baker Cox
Joanna Curtis
Jasbir Dhaliwal
Tammy Hedges
Robert Jackson
Raaj Kurapati
Melanie Murry
Tom Nenon
Ted Townsend
Karen Weddle-West
Laird Veatch

#### **President's Office**

Stephanie Beasley Vicki Deaton Melanie Murry

#### Academic Affairs

Tom Nenon William Akey Abby Parrill-Baker Richard Bloomer John Evans Damon Fleming James G. Gurney **Richard Irwin** Kandi Hill-Clarke Anne Hogan Linda Jarmulowicz Melinda Jones Justin Lawhead Radesh Palakurthi Sally Parish **Robin Poston** Niles Reddick Katharine Schaffzin **Richard Sweigard** Lin Zhan

#### Student Academic Success

Karen Weddle-West Daniel Bureau Vice President for Student Academic Success Associate Vice President, Student Academic Success

#### **Business & Finance**

Raaj Kurapati

Executive Vice President and Chief Financial Officer

Ron Brooks

Tony Poteet

#### **Operations & Facilities**

Vice President for Physical Plant Chief University Planning Officer, Campus Planning and Design

# **Colleges and Departments**

College of Arts and Sciences Fogelman College of Business & Economics College of Communication and Fine Arts College of Education School of Communication Sciences and Disorders College of Health Sciences Herff College of Engineering Loewenberg College of Nursing College of Professional & Liberal Studies Kemmons Wilson School of Hospitality and Resort Management Helen Hardin Honors College University Libraries

# **College of Arts and Sciences Faculty and Staff**

ABBY PARRILL-BAKER, Ph.D., Dean

GARY EMMERT, Ph.D., Associate Dean

ROGER KREUZ, Ph.D., Associate Dean

DEBORAH TOLLEFSEN, Ph.D., Associate Dean

SUSAN FITZGERALD, M.A., Director of Administration

ASHLEY CONNOLLY, College Academic Advisor

# **Aerospace Studies**

HARLEY P. THOMPSON, Lt. Col., United States Air Force, Bachelor Degree Criminal Justice from the University of Memphis (1989), Master Degree in International Relations from Troy State University (1994), Professor of Aerospace Studies

DAVID L. HELTON, Major, United States Air Force Retired, Professional Aeronautics, Embry-Riddle University MAY 2003, Master Degree in Sports Management from The American Military University (2011)

# Anthropology

KERI BRONDO, Ph.D. Chair

KERI BRONDO (2007), Professor: B.A., 1997, University of Delaware; M.A., 1999, Iowa State University; Ph.D., 2006, Michigan State University

LINDSEY RAISA FELDMAN (2018), Assistant Professor: B.A., 2009, University of Arizona; M.A., 2013, University of Arizona; PhD, 2018, University of Arizona

JOHN GILMORE, Instructor-Coordinator: BSJ, 1983, Ohio University, M.Div.; 1987, Southern Methodist University; M.A., 1999, University of Memphis

KATHRYN HICKS (2008), Associate Professor: B.A., University of Calgary; Ph.D., 2008, Northwestern University The online catalog can be accessed at: http://catalog.memphis.edu/index.php KENNETH LATTA (2018), Instructor: B.A., 2010, Christian Brothers University, M.A., 2014, University of Memphis

TED MACLIN (2015), Instructor: B.S., 1991, University of Tennessee; M.S., 1994, University of Tennessee; Ph.D., 2015, University of Georgia

MICHAEL V. PÉREZ (2018), Assistant Professor: B.A., 2000, University of Florida; M.A., 2005, Ph.D., 2011, Michigan State University

FAYANA RICHARDS (2019), Assistant Professor: B.A., 2008, University of Arizona; M.A., 2012, Michigan State University; MPH, 2015, Michigan State University; Ph.D., 2018, Michigan State University.

MATTHEW THOMANN (2018), Assistant Professor: B.A., 2003, DePaul University; M.S., 2009, Pace University; Ph.D., 2014, American University

MICAH M. TRAPP (2013), Associate Professor: B.A., 2002, Denison University; M.A., 2007, Ph.D., 2011, American University

# **Biological Sciences**

DAVID A. FREEMAN, Ph.D., Chair

AMY ABELL (2013), Associate Professor: B.S., 1990, University of California; Ph.D., 1998, University of Iowa

JAMES ADELMAN (2019), Assistant Professor: B.S., 1999, Duke University; Ph.D., 2010, Princeton University

RANDALL BAYER (2007), Professor: B.S., 1978, M.S., 1980, The Ohio State University; Ph.D., 1984, The Ohio State University

MELVIN BECK (1974), Professor: B.S., 1967, Arkansas Tech; Ph.D., 1974, University of Arkansas

KEITH BOWERS (2016), Assistant Professor: B.A., 2008, M.S., 2011, Illinois State University; Ph.D., 2014, Illinois State University

MARTHA P. BROWN (1966), Assistant Professor: B.S., 1963, M.S., 1966, Memphis State University; Ed.D., 2006, University of Memphis

SHAWN P. BROWN (2017), Assistant Professor: B.S., 2009, University of Oregon; Ph.D., 2014, Kansas State University.

DAVID CLARK (2020), Lecturer, Lambuth: B.S., 1999, M.S., 2003, University of Auckland, New Zealand; Ph.D., 2013 University of Illinois Chicago

JUDITH A. COLE (2003), Associate Professor: B.A., 1977, University of Rhode Island; Ph.D., 1985, University of Connecticut

REBECCA COOK (2012), Sr. Lecturer, Lambuth: B.S., 1980, Hendrix College; M.S. 1984, Rice University; Ph.D., 1993, University of Tennessee, Knoxville

LEWIS B. COONS (1976), Professor: B.A., 1964, M.S., 1966, Utah State University; Ph.D., 1970, North Carolina State University

BERNIE DAIGLE (2015), Assistant Professor: B.S., 2002, Cornell University; Ph.D., 2010, Stanford University

MICHAEL H. FERKIN (1995), Professor: B.S., 1977, M.S., 1982, SUNY, Brockport; Ph.D., 1988, Boston University

DAVID A. FREEMAN (2002), Associate Professor & Chair: B.A., 1991, Kent State University; Ph.D., 1996, University of Connecticut

MICHAEL L. KENNEDY (1974), Professor: B.S., 1966, M.S., 1968, Memphis State University; Ph.D., 1975, University of Oklahoma

CHARLES KUBICEK (2015), Lecturer, Lambuth: B.S., 2003, Georgia Institute of Technology; Ph.D., 2009, University of Oregon

CHARLES A. LESSMAN (1988), Professor: B.A., 1970, M.S., 1975, Ph.D., 1980, University of Minnesota

CARLOS E. LOPEZ-ESTRANO (2003), Associate Professor: B.S., 1990, Central University of Venezuela; Ph.D., 1996, Autonomous University of Madrid, Spain

JENNIFER R. MANDEL (2014), Associate Professor: B.A., 2003; Biology, Carson Newman University; Ph.D., 2008, Vanderbilt University

DUANE McKENNA (2010), Professor: B.A., 1998, Western Michigan University; M.S., 2000, University of Illinois, Urbana-Champaign; Ph.D., 2006, Harvard University

1359

MATTHEW J. PARRIS (2000), Associate Professor: B.A., 1994, St. John's University; Ph.D., 1999, University of Missouri, Columbia

EMILY PUCKETT (2018), Assistant Professor: B.S. 2004, North Carolina State University: M.S. 2008, State University of New York, Syracuse: Ph.D., 2015, University of Missouri, Columbia

JAIME SABLE (2016), Assistant Professor: B.A., 2000, Simpson College; M.S., 2008, University of Iowa; Ph.D. 2016, The University of Nebraska

STEVEN D. SCHWARTZBACH (2001), Professor: B.A., 1969, State University of New York, Buffalo; Ph.D., 1975, Brandeis University

ALKA SHARMA (2014), Instructor: B.S., 1995, M.S., 1997, Government Autonomous Science College; Ph.D. 2010, University of Arkansas at Little Rock

OMAR SKALLI (2010), Associate Professor: Director of Integrated Microscopy Center: M.S., 1982, Ph.D., 1987, University of Geneva

THOMAS R. SUTTER (1999), Professor, Chair of Excellence in Functional Genomics: B.S., 1980, St. Bonaventure University; Ph.D., 1988, University of Cincinnati College of Medicine

BARBARA J. TALLER (1983), Associate Professor: B.S., 1971, Baldwin-Wallace College; Ph.D., 1978, University of Wisconsin-Madison

TIT-YEE WONG (1985), Professor: B.S., 1974, M.S., 1976, Murray State University; Ph.D., 1981, University of Houston

# **Bornblum Judaic Studies**

SHAUL BAR, Ph.D., Chair of Excellence and Director

SHAUL BAR (1990), Professor: B.A., 1978, Haifa University; M.A., 1983, Ph.D., 1988, New York University

#### Chemistry

HENRY KURTZ, Ph.D., Interim Chair

WILLIAM A. ALEXANDER (2012), Associate Professor: BS, 2005, Marshall University; PhD, 2009, Virginia Tech

DANIEL BAKER (2006), Associate Professor: B.S., 1992, Central Michigan University; Ph.D., 1998, University of Arizona

TIMOTHY BREWSTER (2015), Assistant Professor: BS, 2008, College of William and Mary; PhD, 2012, Yale University

PETER K. BRIDSON (1980), Associate Professor: B.S., 1975, Ph.D., 1978, University of London

THEODORE J. BURKEY (1985), Professor: B.S. 1976, Harvey Mudd College; M.S., 1978, Ph.D., 1982, University of California, San Diego

KENSHA CLARK (2017), Assistant Professor; B.S., 2001, University of Illinois at Chicago; Ph.D, 2010, University of California, Irvine

NATHAN DEYONKER (2016), Assistant Professor: BS, 2001, University of Michigan; PhD, 2005, University of Georgia

GARY L. EMMERT (2002), Associate Dean/Professor: B.S., 1988, M.S., 1992, Tennessee Technological University; Ph.D., 1999, Miami University (Ohio)

TOMOKO FUJIWARA (2007), Associate Professor: B.S., 1997, M.Eng., 1999, Ph.D., 2001 Kyoto Institute of Technology

CHARLES GARNER (2017), Associate Professor, B.S., University of Nevada, Las Vegas, 1981, PhD. University of Colorado, Boulder, 1986

XIAOHUA HUANG (2010), Associate Professor: B.S., 1996, Jilin University; M.S., 2001, Peking University; Ph.D., 2006, Georgia Institute of Technology

JERMAINE JOHNSON (2015), Lecturer: BS, 2008, Morehouse College; PhD, 2015, University of Memphis

HENRY A. KURTZ (1983), Interim Chair/Professor: B.S., 1972, Georgia Institute of Technology; PhD, 1977, University of Florida

IULIA SACUI (2019), Instructor, B.S., 2004, Youngstown State University; M.S., 2006, Youngstown State University; Ph.D., 2010, Carnegie Mellon University

NANCY SANTAGATA (2018), Instructor, B.S., 2001, Monmouth University; MS, 2003, University of California, San Diego; PhD, 2009, North Carolina State University

PAUL S. SIMONE (2010), Associate Professor: B.S., 2002, M.S., 2006, Ph.D., 2008, University of Memphis;

YONGMEI WANG (2003), Professor: B.S., 1985, University of Science and Technology, Hefei, China; Ph.D., 1990, University of Notre Dame

XUAN ZHAO (2008), Associate Professor: B.S., 1993, Nankai University; M.S., 1996, Peking University; Ph.D., 2002, Texas A&M University

# **Computer Science**

LAN WANG (2004), Ph.D., Chair

VINHTHUY PHAN (2003), Ph.D., Associate Chair

NASIR ALI (2016), Research Assistant Professor: MS: 2008, Lahore University, Ph.D., 2012, École Polytechnique de Montréal

WILLIAM B. BAGGETT (2014), Visiting Assistant Professor: B.S., 1989, M.S., 1994, PhD, 1998, The University of Memphis

DIPANKAR DASGUPTA (1997), Professor: B.E., 1981, Assam Engineering College, Guwahati, India; M. Tech, 1987, Indian Institute of Technology, Kharagpur, India; Ph.D., 1993, University of Glasgow, UK

ŞEN FATIH (2016), Instructor; B.S., 2003, Yeditepe University; M.S., 2006, Southeastern Louisiana University; Ph.D., 2014, University of Arkansas at Little Rock

SCOTT D. FLEMING (2011), Associate Professor: B.A., 1999, M.S., 2001, Western Michigan University; Ph.D., 2009, Michigan State University

XING GAO (2018), Assistant Professor: B.S., 2011, Beijing Institute of Technology, China; Ph.D., 2018, The College of William and Mary

MAXIMILIANO H. GARZON (1984), Professor: B.S., 1975, National University of Colombia; M.S., 1980, Ph.D., 1984, University of Illinois, Urbana

NIRMAN KUMAR(2016), Assistant Professor: B. Tech., 2001, Indian Institute of Technology, Kanpur; M.S., 2004, University of Illinois, Urbana-Champaign; Ph.D., 2014, University of Illinois, Urbana-Champaign

SANTOSH KUMAR (2006), Professor & Lillian and Morrie Moss Chair of Excellence: B.Tech., 1998, Indian Institute of Technology, Varanasi; M.S., 2002, Ph.D., 2006, The Ohio State University

KRIANGSIRI MALASRI (2007), Instructor/Coordinator: B.S., 2003, M.S., 2005, Georgia Institute of Technology; M.S., 2007, University of Memphis

VINHTHUY PHAN (2003), Associate Professor, Associate Chair: B.A., 1998, Brandeis University; M.S., 2001, Ph.D., 2003, Stony Brook University

VASILE RUS (2004), Professor: B.S., 1997, Technical University of Cluj-Napoca, Romania; M.S., 1999, Ph.D., 2002, Southern Methodist University

SAJJAN G. SHIVA (2002), Professor: B.E., 1969, Bangalore University: M.E.E., 1971, Ph.D., 1975, Auburn University

LAN WANG (2004), Professor, Chair: B.S., 1997, Peking University, China; M.S., 1999, Ph.D., 2004, University of California at Los Angeles

DEEPAK VENUGOPAL (2015), Assistant Professor: B.E., 2001, Bangalore University: MS., 2004, Ph.D., 2015, University of Texas at Dallas

THOMAS WATSON (2016), Assistant Professor: B.S., 2008, University of Wisconsin-Madison; Ph.D., 2013, University of California Berkeley

MYOUNGGYU WON (2013), Assistant Professor: B.E., 2007, Sogang University, South Korea; Ph.D., 2013, Texas A&M University at College Station

KAN YANG (2017), Assistant Professor: B. Eng., 2008, University of Science and Technology of China; Ph.D., 2013, City University of Hong Kong

1361

JAMES YU (2017), Instructor: B.S., 1977, University of Alberta, M.S., 1981, University of Saskatchewan, Ph.D., 1986, McMaster University.

XIAOFEI ZHANG (2018), Assistant Professor: B.S., 2006, M.S., 2009, the University of Science and Technology Beijing; Ph.D., 2013, the Hong Kong University of Science and Technology

# **Earth Sciences**

DANIEL LARSEN, Ph.D., Chair

ANZHELIKA ANTIPOVA (2011), Associate Professor: B.A., 1992, Odessa State University; M.A., 2007, Ph.D., 2010, Louisiana State University

MERVIN J. BARTHOLOMEW (2002), Professor: B.A., 1964, The Pennsylvania State University; M.S., 1969, University of Southern California; Ph.D., 1971, Virginia Polytechnic Institute and State University

DORIAN BURNETTE (2012), Associate Professor: B.S., 1999, Mississippi State University; M.S., Emporia State University; Ph.D., 2009, University of Arkansas

RANDEL T. COX (1999), Professor: B.S., 1981, M.S., 1986, University of Arkansas; Ph.D., 1995, University of Missouri

DAVID H. DYE (1981), Professor: B.A., 1972, Memphis State University; M.A., 1976, Louisiana State University; Ph.D., 1980, Washington University

ARLEEN A. HILL (2003), Professor: B.S., 1994, Mary Washington College; M.S., 1998, Ph.D., 2002, University of South Carolina

JULIE JOHNSON (2014), Instructor/Coordinator: B.S., 2003, Pennsylvania State University; Ph.D., 2012, Florida International University

HSIANG-TE KUNG (1981), Professor: B.S., 1968, Chinese Culture University; M.S., 1972, Ph.D., 1980, University of Tennessee, Knoxville

YOUNGSANG KWON (2013), Assistant Professor: B.S., 2001, Korea University; M.S., 2004, Seoul National University; Ph.D., 2012, State University of New York at Buffalo

DANIEL LARSEN (1995), Professor, Chair: B.S., 1985, Arizona State University; M.S., 1988, Ohio State University; Ph.D., 1994, University of New Mexico

DEBORAH L. LESLIE (2019), Assistant Professor: B.S., 2005, University of Mississippi; M.S., 2008, Arkansas State University; Ph.D., 2013, Ohio State University

ANDREW M. MICKELSON (2005), Associate Professor: B.A., 1990, Beloit College; M.A., 1996, Ph.D., 2002, Ohio State University

ESRA OZDENEROL (2003), Professor: B.S., 1996, University of Ankara (Turkey); M.L.A., 1996, Ph.D., 2000, Louisiana State University

RYAN M. PARISH (2013), Associate Professor: B.A., Grove City College; M.S., 2009, Murray State University; Ph.D., 2013, University of Memphis

JOSE PUJOL (1985), Professor: B.S., 1968, Universidad del Sur, Argentina; M.S., 1982, University of Alaska; Ph.D., 1985, University of Wyoming

ELIZABETH RHENBERG (2019), Visiting Assistant Professor: B.S., 2005, University of Tennessee at Martin; M.S., 2007, Kent State University; Ph.D., 2011, West Virginia University

ROY B. VAN ARSDALE (1993), Professor: B.A., 1972, Rutgers University; M.S., 1974, University of Cincinnati; Ph.D., 1979, University of Utah

# English

#### JOSHUA PHILLIPS, Ph.D., Chair

REBECCA ADAMS (2016), Associate Professor: B.A., 1998, M.A., 2000, Brigham Young University; Ph.D., 2004, Georgetown University

IRENE AMSTER (2019), Instructor: B.A. 2008, University of Pennsylvania; M.A. 2001, San Francisco State University The online catalog can be accessed at: http://catalog.memphis.edu/index.php TERRY ANSBRO (2011), Instructor: B.A., 1997, University of West Florida; M.A., 1999, The University of Georgia

BRIAN BAAKI (2018), Postdoctoral Fellow B.A., 2002, M.A. 2010, Brigham Young University; Ph.D. 2016, City University of New York Graduate Center

GREGORY E. BARLOW (2011), Instructor: B.A., 2004, Valdosta State University; M.A., 2006, Georgia Southern University (drop "n")

ALICE BOLIN (2017), Assistant Professor: B.A. 2008, University of Nebraska-Lincoln; M.A. 2011, University of Montana

CARLOS BOLTON (2007), Instructor: B.A., 2002, Christian Brothers University; M.F.A., 2006, University of Memphis

THERON BRITT (1990), Associate Professor: B.A., 1978, University of Oregon; M.A., 1982, Ph.D., 1990, University of California at Irvine

RACHEL KAPLOWITZ CANTRELL (2017), Instructor: B.A., 2007, M.A. 2009, Boston College; Ph.D. 2013, University of Memphis

CRISTINA MARIA CERVONE (2012), Associate Professor: B.A., 1987, Williams College; M.A., 1997, Ph.D., 2004, University of Virginia

WILLIAM DEAN CLEMENT (2019), Instructor: B.A. 2005, University of Mississippi; M.A. 2009 University of Montana; PhD. 2015 University of South Carolina

LORINDA COHOON (2004), Associate Professor: B.A., 1992, West Chester University; M.A., 1994, Simmons College; Ph.D., 2001, University of Southern Mississippi

MICHAEL J. COMPTON (1996), Instructor: B.A., 1993, M.A., 1995, M.F.A., 1997, University of Memphis

SHELBY CROSBY (2008), Associate Professor: B.A., 1997, Morehead State University; M.A., 2003, Ph.D., 2007, State University of New York at Buffalo

JEROME CUSSON (2017), Instructor: B.A., 2007, Columbia College Chicago; M.A., 2014, Northeastern Illinois University (add 'n")

CATHERINE DICE (2005), Instructor: B.A., 1989, M.A., 1991, University of Memphis

DARRYL P. DOMINGO (2011), Associate Professor: B.A., 2001, University of Toronto at Scarborough; M.A., 2002, Ph.D., 2009 University of Toronto

WILLIAM E. DUFFY (2013), Associate Professor: B.A., 2003, Elon University; M.A., 2006, Ph.D., 2011, University of North Carolina at Greensboro

KATHERINE FREDLUND (2016), Associate Professor: B.A., 2006, M.A., 2008, Saint Bonaventure University; Ph.D., 2012, Bowling Green State University

RONALD FUENTES (2012), Associate Professor: B.A., 1993, University of British Columbia; M.A.T., 2005, Ph.D., 2009, University of Washington

ANA GRACE GAL (2014), Instructor: B.A., 2005, M.A., 2006, Babes-Bolyai University; Ph.D., 2013, University of Memphis

ROMY GHANEM (2018), Assistant Professor: B.A. 2008, M.A. 2010, Ohio University; Ph.D. 2017, Northern Arizona University

SAGE GRAHAM (2004), Associate Professor: B.A., 1989, Rhodes College; M.A., 1995, University of Memphis; Ph.D., 2003, Georgetown University

DONAL HARRIS (2013), Associate Professor: B.A., 2005 M.A., 2009, Ph.D., 2013, California State University, Los Angeles

PAULA HAYES (2017), Instructor: B.A. 1998, M.A. University of Tennessee Knoxville; Ph.D. 2008, University of Memphis

GRAY HILMERSON (2016), Senior Lecturer, Lambuth Campus: B.A., 2001, M.A., 2005, Cal State University, Fullerton; M.F.A., 2011, University of California, Irvine; Ph.D., 2016, Binghamton University, SUNY

JOSEPH JONES (2004), Associate Professor: B.A., 1983, M.A., 1993, Ph.D., 2002, University of Arizona

TAMMY R. JONES (2007), Instructor: B.A., 1990, Delta State University; M.A., 1992, University of Memphis

LOEL KIM (1999), Associate Professor: B.A., 1991, University of Wyoming; M.A., 1992, Ph.D., 1998, Carnegie Mellon University

ELIZABETH LANE (2017), Assistant Professor: B.A., 2010, Transylvania University; M.A., 2012, DePaul University; Ph.D., 2017, Purdue University

BRAD MCADON (2002), Associate Professor: B.A., 1985, Western Baptist College; M.A., 1997, Sonoma State University; Ph.D., 2002, Texas A&M University

1363

LADRICA MENSON-FURR (2003), Associate Professor: B.A., 1993, Spelman College; M.A., 1995, Ph.D., 2002, Louisiana State University

CAREY JAMES MICKALITES (2007), Associate Professor: B.S., 1994, M.A., 1996, East Tennessee State University; Ph.D., 2005, Michigan State University

VERNER MITCHELL (1999), Professor: B.S., 1979, United States Air Force Academy; M.A., 1985, Colorado State University; Ph.D., 1995, Rutgers University

MARIA MUMMERT (2017), Instructor: B.A., 2000, M.A. 2005 University of Wisconsin: Ph.D. 2011, University of Wisconsin

BESS MYERS (2019), Instructor: B.A., 2010, The College of New Jersey; M.A., 2012, The College of New Jersey; M.A. 2015, University of Oregon; 2019, PhD, University of Oregon

C. NINA MYERS (2015), Instructor: B.A., 2009, Maryville College; M.A., 2014, New Mexico Highlands University

JOSHUA PHILLIPS (2002), Associate Professor, Chair: B.A., 1991, Columbia University; M.A., 1995, Ph.D., 2002, University of Chicago

RHONDA R. POWERS (2010), Instructor: B.A., 1998, M.A., 2000, Missouri State University

DON RODRIGUES (2019), Assistant Professor: M.A., 2013, Vanderbilt University; PhD., 2017, Vanderbilt University

COURTNEY MILLER SANTO (2011), Instructor: B.A., 1998, Washington and Lee University; M.F.A., 2011, University of Memphis

ERIC SCHLICH (2019), Assistant Professor: MFA, 2012, Bowling Green State Kentucky; PhD., 2018, Florida State University

KATHY LOU SCHULTZ (2006), Associate Professor: B.A., 1990, Oberlin College; M.F.A., 1996, San Francisco State University; Ph.D., 2006, University of Pennsylvania

JEFFREY M. SCRABA (2006), Associate Professor: B.A., 1990, University of Calgary; M.A., 2000, Ph.D., 2006, Rutgers University

STACY S. SMITH (2009), Instructor: B.A., 1990, M.A.T., 1991, M.A., 2006, University of Memphis

SCOTT SUNDVALL (2018), Assistant Professor: B.A. 2009, M.A. 2011, Bowling Green State University; Ph.D. 2016, University of Florida

EMILY THRUSH (1990), Professor: B.A., 1971, Duke University; M.A., 1979, University of Florida; Ph.D., 1990, Georgia State University

TERRENCE TUCKER (2012), Associate Professor: B.A., 2000, Louisiana State University; M.A., 2002, Ph.D., 2006, University of Kentucky

G. CALEN VERBIST (2016), Instructor: B.A., 2007, Samford University; M.A., 2011, University of Georgia

ELIZABETH WESTON (2012), Senior Lecturer, Lambuth Campus: B.A., 1994, M.A., 1996, College of William and Mary; Ph.D., 2004, University of North Carolina at Chapel Hill

MARCUS WICKER (2017), Associate Professor: B.A., 2006, Western Michigan University; M.F.A., 2010, Indiana University

SHARESE WILLIS (2019), Instructor: B.A., 1996, Tennessee State University; M.A., 2000, Clark Atlanta University; PhD., 2010, University of Memphis

LAKEITHA WILSON (2018), Instructor: B.A. 2005, M.A. 2011, Clark Atlanta University: Ph.D. Clark Atlanta University

EVELYN WRIGHT (2015), Associate Professor: B.A., 1995, Emory University; M.A., 2002, American University; Ph.D., 2009, Georgetown University

# History

DANIEL UNOWSKY, Ph.D., Chair

CATHERINE ARNOLD (2018), Assistant Professor: B.A., 2010. Wellesley College; M.A., 2014, M.Phil, 2014, Ph.D., 2017, Yale University

BEVERLY G. BOND (1996), Professor: B.S., 1969, M.A., 1969, Memphis State University; M.Ed., 1976, Columbia University; Ph.D., 1996, University of Memphis

PETER J. BRAND (2001), Professor: B.A., 1990, University of Texas at Arlington; M.A., 1992, Memphis State University; Ph.D., 1998, University of Toronto

1364

MICHELE L. COFFEY (2013), Instructor: B.A., 2000, M.A., 2002, Baylor University; Ph.D., 2010, University of South Carolina

CHARLES WANN CRAWFORD (1962), Professor, Director, Oral History Research Office: B.A., 1953, Harding College; M.A., 1958, University of Arkansas; Ph.D. 1968, University of Mississippi

ANDREW M. DAILY (2011), Associate Professor: B.A., 2001, Lewis and Clark College; Ph.D., 2011, Rutgers University

BRADLEY J. DIXON (2019), Assistant Professor: B.A., 2005, M.A. 2013, North Carolina State University; Ph.D., 2018, The University of Texas at Austin

GUIOMAR DUENAS-VARGAS (2003), Professor: B.A., 1969 Xavier University; M.A., 1983, Ph.D., 1995, University of Texas at Austin

CHRISTINE EISEL (2012), Instructor: B.A., 2003, Lourdes University; M.A., University of Toledo; Ph.D., 2012, Bowling Green State University

JAMES EDWARD FICKLE (1968), Professor: B.S., 1961, Purdue University; M.A., 1963, Ph.D., 1970, Louisiana State University

ARAM G. GOUDSOUZIAN (2004), Professor: B.A., 1994, Colby College; M.A., University of Massachusetts-Amherst; Ph.D., 2002 Purdue University

CHRYSTAL E. GOUDSOUZIAN (2013), Instructor/Coordinator: B.A., University of California Los Angeles; M.A., 2007, Ph.D., 2012, The University of Memphis

BENJAMIN GRAHAM (2016), Assistant Professor: B.A., 2002, Hastings College; M.A., 2005, University of Nebraska—Lincoln; Ph.D., 2014, University of Michigan

BRIAN KWOBA (2017), Assistant Professor: B.A., 2004, Cornell University; M.A.T., 2007, Tufts University; Ph.D., 2017, University of Oxford, United Kingdom

DENNIS H. LAUMANN (2000), Professor: B.A., 1992, State University of New York at Binghamton; M.A., 1994, Ph.D., 1999, University of California, Los Angeles

SCOTT MARLER (2007), Associate Professor: B.A., 1996 University of Houston-Clear Lake; M.A., 2000, Ph.D., 2007, Rice University

GREGORY MOLE (2017) Instructor: B.A., 2006, Colgate University; M. Litt. In War Studies, 2008, University of Glasgow, Scotland; M.A., 2011, Ph.D., 2016, University of North Carolina at Chapel Hill

SUSAN EVA O'DONOVAN (2009), Associate Professor: B.A., 1987, M.A., 1990, Ph.D., 1997, University of California San Diego

SUZANNE ONSTINE (2006), Associate Professor: B.A., 1991, University of Arizona; M.A., 1993, Ph.D., 2001, University of Toronto

CAROLINE R. PEYTON (2019), Instructor: B.A., 2008, University of Arkansas, Fayetteville; M.A., 2012, Ph.D., 2016, University of South Carolina

CATHERINE PHIPPS (2006), Associate Professor: B.A., 1990, Carleton College; M.A., 1998, Ph.D., 2006, Duke University

SARAH POTTER (2008), Associate Professor: B.A., 1999, Columbia University; M.A., 2002, Ph.D., 2008, University of Chicago

AMANDA LEE SAVAGE (2014), Instructor/Coordinator: B.A., 2008, Virginia Commonwealth University; M.A., 2011, The College of William and Mary

STEPHEN K. STEIN (2001), Associate Professor, B.A., 1989, M.A., 1992, University of Colorado at Denver; Ph.D., 1999, The Ohio State University

BEVERLY A. TSACOYIANIS (2013), Assistant Professor: B.A., 2004, Brandeis University; M.A., 2009; Ph.D., 2014, Washington University, St. Louis

DANIEL L. UNOWSKY (1999), Professor, Chair: B.A., 1988, University of Michigan; M.A., Ph.D., 2000, Columbia University

CHRISTINA WOOLNER (2016), Assistant Professor: B.A., 1996, Hampshire College; M.A., 2006, San Francisco State University; Ph.D., 2014, University of Michigan

ANDREI ZNAMENSKI (2008), Professor: M.A., 1984, Samara (Kuibyshev) University, Russia; Ph.D., 1989, St. Petersburg Herzen University, Russia; Ph.D., 1997, University of Toledo

# **Institute for Intelligent Systems**

ALISTAIR WINDSOR, Ph.D., Director

ANDREW OLNEY (2007, Psychology), Professor: B.A., 1998, College of Professional & Liberal Studies London; M.S., 2001, University of Sussex; Ph.D., 2006, University of Memphis

PHIL PAVLIK (2011, Psychology), Associate Professor: B.A., 1992, University of Michigan; Ph.D., 2005, Carnegie Mellon University

GAVIN BIDELMAN (2012, School of Comm. Sciences & Disorders), Associate Professor: B.M. & B.S, 2007, University of Michigan; Ph.D., 2011, Purdue University

BONNY BANERJEE (2011, Electrical & Computer Engineering), Associate Professor: B.E., 2000, Jadavpur University; M.S., 2002, Ohio State University; Ph.D., 2007, Ohio State University

VASILE RUS (2004, Computer Science), Professor: B.A., 1997, Technical University of Cluj-Napoca; M.S., 1999, Southern Methodist University; Ph.D., 2002, Southern Methodist University

JOHN SABATINI, (2019, IIS), Distinguished Research Scientist: B.A., 1984, University of Chicago, Ph.D., 1997, University of Delaware.

ALISTAIR WINDSOR (2007, Mathematical Sciences), Associate Professor: B.Sc., 1995, Victoria University of Wellington, B.C.A., 1996, Victoria University of Wellington, Ph.D., 2002, Pennsylvania State University.

LEAH WINDSOR (2006, IIS), Research Assistant Professor: B.S., 1998, Georgetown University; M.A., 2005, University of Memphis; Ph.D., 2012, University of Mississippi

# **Mathematical Sciences**

IRENA LASIECKA, Ph.D., Chair, Distinguished University Professor

PAUL NEVILLE BALISTER, Ph.D., Associate Chair,

MANOHAR AGGARWAL (2006), Instructor: B.S., 1958, Punjab University, India; M.S., 1960, Delhi University, India; Dr.Rer.Nat., 1969, Eotvos Lorand University, Hungary; Ph.D., 1977, Delhi University, India.

GEORGE A. ANASTASSIOU (1986), Professor: B.A., 1975, University of Athens, Greece; M.A., 1981, Ph.D., 1984, University of Rochester

ALPHA BA (2015), Instructor: B.S., 2007, M.S., 2011, University of Memphis

DALE BOWMAN (2011), Associate Professor: B.S., 1984, Middle Tennessee State University; Ph.D., 1993, University of Memphis

DIONYSIA S. BACOPULOS (1989), Instructor: B.S.E., 1979, M.S., 1982, Memphis State University

PAUL NEVILLE BALISTER (1998), Professor, Associate Chair: B.A., 1987, M.A., 1991, Ph.D., 1992, Cambridge University

BELA BOLLOBAS (1994), Professor, Hardin Distinguished Chair of Excellence in Combinatorics: Dr. Rer. Nat., 1967, Budapest; Ph.D., 1972, D.Sc. 1985, Cambridge University

MARIA F. BOTELHO (1988), Professor: B.S., 1980, University of Porto; Ph.D., 1988, University of California, Berkeley

JAMES T. CAMPBELL (1984), Professor: B.S., 1978, Georgia Institute of Technology; M.S., 1982, Ph.D., University of North Carolina-Chapel Hill

TSZ HO CHAN (2015), Instructor: B.S., 1996, University of Illinois at Urbana-Champaign; Ph.D., 2002, University of Michigan at Ann Arbor The online catalog can be accessed at: http://catalog.memphis.edu/index.php HONGQIU CHEN (2000), Professor: B.S., 1983, Chengdu University of Sciences and Technology; M.A., 1988, Academia Sinica; Ph.D., 1998, University of Texas, Austin

1366

SU CHEN (2013), Assistant Professor: M.S., 2008, Ph.D., 2013, Oklahoma State University

LIH-YUAN DENG (1984), Professor: B.S., 1975, M.S., 1977, National Taiwan University; M.S. 1979, Purdue University; M.S., 1982, Ph.D., 1984, University of Wisconsin-Madison

NATALIYA DOROSHENKO (2011), Instructor: M.S., 1992, University of Kiev

DAVID DWIGGINS (2006), Instructor/Coordinator: B.A., 1980, Southwestern at Memphis; M.S., 1984, Memphis State University; Ph.D., 1993, Southern Illinois University at Carbondale

DAWN ENGLERT (2012), Instructor, Lambuth Campus: B.S., 1994, Union University; M.S., 2008, University of Tennessee at Martin

MISTY TURNER FREEMAN (2005), Instructor: B.S., 1990, M.S., 1992, University of Mississippi

EBENEZER O. GEORGE (1983), Professor: B.A., 1968, Harvard University; M.S., 1972, University of Illinois; Ph.D., 1977, University of Rochester

GISELE RUIZ GOLDSTEIN (1996), Professor: B.S., 1980, Ph.D., 1986, Tulane University

JEROME A. GOLDSTEIN (1996), Professor: B.S., 1963, M.S., 1964, Ph.D., 1967, Carnegie Mellon University

ANGELA GRANT (1999), Instructor: B.A., 1980, Stephens College; M.S., 1984, Ph.D., 1988, University of Arkansas

DAVID GRYNKIEWICZ (2013), Associate Professor: M.A., Bates College; Ph.D., 2006, California Institute of Technology

JOHN R. HADDOCK (1970), Professor: B.A., 1966, M.S., 1968, Ph.D., 1970, Southern Illinois University

THOMAS C. HAGEN (2003), Professor: M.S., 1995, University of Texas at Dallas; Ph.D., 1998, Virginia Polytechnic Institute and State University

ANNA H. KAMINSKA (1989), Professor: M.S., 1973, Ph.D., 1978, Doctor Habilitatus, 1986, A. Mickiewicz University, Poznan, Poland

ROBERT KOZMA (2000), Professor: M.Sc., 1982, Moscow Energy University; M. Sc., 1988, Eotvos University; Ph.D., 1992 Delft University of Technology, Emeritus Professor.

IRENA LASIECKA (2013), Distinguished University Professor, Chair: M.S., 1972, Ph.D., 1975, University of Warsaw

PEI-KEE LIN (1986), Professor: B.S., 1973 Tsing Hua University; M.S., 1981, Ph.D., 1980, Ohio State University

BEN MCCARTY (2012), Associate Professor: B.S., 2005, University of Texas at Tyler; M.S., 2007, Ph.D., 2012, Louisiana State University

RANDALL MCCUTCHEON (2001), Professor: B.A., 1988, Anderson College; Ph.D., 1995, The Ohio State University

VLADIMIR S. NIKIFOROV (2003), Professor: M.S., 1978, Ph.D., 2004, Sofia State University

JOSHUA OLADELE (2012), Instructor: M.S., 2005, Air Force Institute of Technology

ILHAM TAYAHI (2016), Instructor Coordinator: B.S., 2001, M.S., 2002, Bordeaux I University, France; M.A.T., 2016, University of Memphis

ROBERTO TRIGGIANI (2013), Distinguished University Professor: M.S., 1970, Ph.D., 1973, University of Minnesota

MATE WIERDL (1995), Professor: B.S., 1985, The Eotvos Lorand University; Ph.D., 1989, The Ohio State University

ALISTAIR WINDSOR (2007), Associate Professor: B.Sc., 1995, B.C.A., 1995 Victoria University of Wellington; Ph.D., 2002, Pennsylvania State University

CHING-CHI YANG (2019), Assistant Professor, PhD 2019, Statistics, Pensylvania State University,

BENTUO ZHENG (2010), Associate Professor: B.S., 1999, M.S., 2002, Peking University; Ph.D., 2007, Texas A&M University

# **Military Science**

PT CHRISTOPHER T. LAWS (2019), Captain, Assistant Professor of Military Science

MSG STEPHEN L. GRAHAM (2017), Master Sergeant, Senior Military Instructor

KARLISHA BENYMON (2018), Enrollment and Recruiting Operations Officer

CASSIUS DAVIS (2013), Logistic Technician and Supply

LTC CURT H. SCHULTHEIS (2019), Lieutenant Colonel, Professor of Military Science and Battalion Commander

THEO WALLACE (2017), Enrollment and Human Resource Administration

DOUGLAS P. HUEY (2013), Contractor, Military Science Instructor: B.S., 1988, Christian Brothers University

# **Naval Science**

CAPTAIN DAVID D. NEAL, USN, Professor of Naval Science

JUSTIN STEARNS (2019), Gunnery Sergeant, U.S. Marine Corps, Assistant Marine Officer Instructor

RICARDO M. ESCANDON (2017), Commander, U.S. Navy, Associate Professor: B.S., 1995, United States Naval Academy; M.A., 2010, Naval War College

KEVYN EVANS (2019), Lieutenant, U.S. Navy, Assistant Professor: B.L.S., 2014, University of Memphis

THOMAS MONTALBANO (2018), Captain, U.S. Marine Corps, Assistant Professor: B.A., 2012, University of Notre Dame

DAVID D. NEAL (2015), Captain, U.S. Navy, Professor of Naval Science: B.S., 1994, University of Arkansas; M.S, 2002, Naval Postgraduate School

DEREK VON DISTERLO (2019), Lieutenant, U.S. Navy, Assistant Professor: B.S., 2014, Oregon State University

# Philosophy

REMY DEBES, Ph.D., Chair

REMY DEBES (2006), Associate Professor, Chair: B.A., 1997, Boston University; Ph,D., 2006, University of Michigan

SHAUN GALLAGHER (2011), Professor, Morrie and Lillian Moss Chair of Excellence: B.A., 1971, St. Columban's College; M.A., 1976, Villanova University; M.A., 1987, State University of New York at Buffalo; Ph.D., 1990, Bryn Mawr College

DAVID MIGUEL GRAY (2017), Assistant Professor: B.A., 1997, Columbia University, M.A., 2002, Harvard University, Ph.D., 2008, Harvard University

MARY BETH MADER (2002), Professor: A.B., 1982, Smith College; Ph.D., 1998, University of Texas at Austin

MICHAEL J. MONAHAN (2017), Associate Professor: B.A., 1995, Purdue University, M.A., University of Illinois at Urbana/Champaign, Ph.D., 2003, University of Illinois at Urbana/Champaign

THOMAS NENON (1985), Professor, Provost: B.A., 1972, Regis College; M.A., 1974, Boston College; Ph.D., 1983, University of Freiburg

TIMOTHY ROCHE (1985), Associate Professor: B.A., 1974, Washington and Lee University; M.A., 1980, Ph.D., 1984, University of California-Davis

KAS SAGHAFI (2006), Associate Professor: B.S., 1990, Duquesne University; M.A., 1995, Ph.D., 2002, DePaul University

DANIEL J. SMITH (2019), Assistant Professor: B.A., 2011, University of Warwick; M.A, 2012, University of Warwick; Ph.D., 2018, Pennsylvania State University

LINDSEY STEWART (2017), Assistant Professor: B.A., 2009, Calvin College, M.A, 2013, Pennsylvania State University, Ph.D., 2016, Pennsylvania State University

DEBORAH P. TOLLEFSON (2002), Professor: B.A., 1992, St Anselm College; M.A., 1995, University of South Carolina; Ph.D., 2002, Ohio State University

1368

# **Physics and Materials Science**

FIROUZEH SABRI, Ph.D, Chair

GUSTAV BORSTAD (2019), Instructor/Coordinator: B.S., 2008, University of Wisconsin - La Crosse; Ph.D., 2014, Washington State University

THANG B HOANG (2016), Assistant professor; B.S., 1997, Hanoi University of Technology, M.S., 2000, Institute of Physic Hanoi, Ph.D., 2008, University of Cincinnati OH (2008).

M. SHAH JAHAN (1980), Professor: B.Sc. 1963, M.S., 1964, Rajshahi University (Bangladesh); Ph.D., 1977, University of Alabama

MOHAMED LARADJI (2002), Professor: B.Sc., 1986, University of Sidi Bel-Abbes (Algeria); M.Sc., 1989, Ph.D., 1993, McGill University

SAMUEL L. MENSAH (2013), Instructor/Coordinator: B.Sc. 1999, University of Cape Coast (Ghana); M.Phil., 2002 University of Cambridge; M.S. 2006, Michigan Technological University; Ph.D., 2011, University of Arkansas

SANJAY R. MISHRA (1999), Professor: B.Sc., 1987, M.Sc., 1989, South Gujarat University, India; M.S. Pittsburg State University, KS, USA, Ph.D., 1996, University of Missouri, Rolla. MO.

FRANCISCO MULLER SANCHEZ (2018), Assistant Professor: B.Sc., 2002, National Autonomous University of Mexico (Mexico); M.S., 2004, Karlsruhe Institute of Technology (Germany); Ph.D., 2008, Max-Planck Institute for Extraterrestrial Physics and Ludwig- Maximilians University of Munich (Germany)

CHENHUI PENG (2018), Assistant Professor: B.Sc., 2007, Qufu Normal University (China); M.S., 2011, Chinese Academy of Sciences; Ph.D. 2016, Kent State University

JOANNE FARLEY RHODES (2013), Instructor: B.S.E.E., 1980, B.S., 1984, M.S., 1988, University of Memphis

FIROUZEH SABRI (2007), Associate Professor, Chair: B.S., 1995 University of Wales at Swansea; M.Phil., 1999, Cambridge University; Ph.D., 2002, Cambridge University

XIAO SHEN (2015), Assistant Professor: B.Sc., 2001, Fudan University; Ph.D., 2009, SUNY Stony Brook

# **Political Science**

MATTHIAS KAELBERER, Ph.D., Chair

EBONY DAWKINS (2014), Instructor/Coordinator: B.S., 2004, University of Tennessee; J.D., 2008, University of Memphis

NICOLE DETRAZ (2009), Associate Professor: B.A., 2002, Louisiana State University; M.A., 2005, Ph.D., 2009, Colorado State University

ERIC GROENENDYK (2009), Associate Professor: B.A., 2001, Ph.D., 2009, University of Michigan

SHELBY GROSSMAN (2017), Assistant Professor: B.A., 2006, Emory University; M.A., 2012, Harvard University; Ph.D., 2016, Harvard University

MOLLY HENDERSON (2014), Instructor/Coordinator: B.A., 1993, University of Science and Arts of Oklahoma, M.A., 1996, University of Central Oklahoma; Ed.D., 2006, Oklahoma State University

MATTHIAS KAELBERER (2004), Professor, Chair: B.A., 1987, University of Tubingen; M.A., 1991, Ph.D., 1997, Princeton University

JEFFREY LEEDHAM (2013), Instructor: B.A. 2011, M.A., 2013, University of Memphis

WILLIAM DAVID MADLOCK (2002), Instructor: B.A., 1973, M.A., 1977, Memphis State University

DURSUN PEKSEN (2012), Professor: B.A., 2001, Marmara University; M.A., 2003, University of Indianapolis; Ph.D., 2008, University of Missouri MICHAEL SANCES (2015), Assistant Professor: B.A., 2006, University of Massachusetts, Ph.D., 2014, Massachusetts Institute of Technology

SHARON STANLEY (2006), Professor: B.A., 1999, Dartmouth College; M.A., 2000, Ph.D., 2006, University of California, Berkeley

## Psychology

RANDY G. FLOYD, Ph.D. Chair

MOLLIE ANDERSON (2016), Instructor: B.S., 1994, Pepperdine University; M.S., 2012, Ph.D., 2016, University of Memphis

FRANK ANDRASIK (2010), Distinguished Professor: B.A., 1971, Wright State University; M.S., 1973, Ph.D., 1979, Ohio University

KAREN LINVILLE BAKER (2014), Senior Lecturer: B.S., 1985, University of Tennessee, Knoxville; M.S., 1988, Ph.D., 1992, University of Memphis

J. GAYLE BECK (2008), Professor, Lillian and Morrie Moss Chair of Excellence: A.B., 1979, Brown University; Ph.D., 1984 State University of New York at Albany

KRISTOFFER S. BERLIN (2012), Associate Professor: B.A., 1996, The University of California-Santa Cruz; M.S., 2003, Ph.D., 2007, University of Wisconsin

JEFFREY S. BERMAN (1985), Professor: B.A., 1972, Reed College; A.M., 1976, Ph.D., 1979, Harvard University

CHERYL A. BOWERS (2011), Senior Lecturer: B.S., 1991, Lambuth College; M.S., 1994, Ph.D., 1996, University of Memphis

GINA M. CAUCCI (2016), Visiting Assistant Professor: B.A., 2005, Massachusetts College of Liberal Arts; M.S., 2008, Ph.D., 2011, University of Memphis

ROBERT COHEN (1976), Professor: B.A., 1970, University of Virginia; M.A., 1972, Ph.D., 1975, Miami University (Ohio)

MELLONI NICOLE COOK (2003), Associate Chair of Research Initiatives, Associate Professor: B.S., 1991, Mary Washington College; Ph.D., 1996, The Pennsylvania State University

THOMAS KEVIN FAGAN (1976), Professor: B.S.Ed., 1965, M.A., 1966, Ph.D., 1969, Kent State University

RANDY G. FLOYD (2001), Professor, Chair: B.A., Hendrix College, 1994; M.Ed., 1995, Ph.D., 1999, Indiana State University

TRACY N. HIPP (2018), Assistant Professor: B.A., 2002, California State University Los Angeles; B.S., 2008 Georgia State University; M.A., 2012, Georgia State University; Ph.D., 2016, Georgia State University

DAVID A. HOUSTON (1992), Associate Professor: B.A., 1975, Northwestern University; J.D., 1980, Ph.D., 1989, Indiana University

KATHRYN H. HOWELL (2013), Associate Professor: B.S., 2004, Cornell University; M.S., 2008, Ph.D., 2011, University of Michigan

XIANGEN HU (1993), Professor: B.S., 1982, M.S., 1985, Huazhong University; M.A., 1991, Ph.D., 1993, University of California, Irvine

STEPHANIE HUETTE (2013), Assistant Professor: B.S., 2007, University of Iowa; Ph.D., 2013, University of California, Merced

XU (Lilya) JIANG (2015), Assistant Professor: B.S., 2009, Beijing Normal University; M.A., 2012, Ph.D., 2015, University of South Carolina

ROGER JAMES KREUZ (1988), Professor, Associate Dean: B.A., 1983, University of Toledo; M.A., 1985, Ph.D., 1987, Princeton University

DERANDA B. LESTER (2015), Research Assistant Professor: B.S., 2004, Millsaps College; M.S., 2007, Ph.D., 2011, University of Memphis

BROOK A. MARCKS (2013), Clinical Assistant Professor: B.A., 2000, University of Wisconsin-Eau Claire; M.S., 2003, Ph.D., 2007, University of Wisconsin-Milwaukee

MEGHAN MCDEVITT-MURPHY (2006), Professor: B.A., 1997, Rutgers University; M.S., 2001, Ph.D., 2004, Auburn University

ELIZABETH BENTON MEISINGER (2007), Associate Professor: B.A., 2000, University of North Carolina; M.S., Ph.D., 2006, University of Georgia

1370

JAMES MURPHY (2006), Professor: B.A., 1995, Seton Hall University; M.S., 1999, Ph.D., 2003, Auburn University

ANDREW MCGREGOR OLNEY (2007), Professor: B.A., 1998 College of Professional & Liberal Studies of London; M.S., 2001, University of Sussex; Ph.D., 2006, University of Memphis

PHILIP I. PAVLIK (2011), Associate Professor: B.A., 1992, University of Michigan; Ph.D., 2005, Carnegie Mellon University

LESLIE A. ROBINSON (2002), Professor: B.A., 1978, Rhodes College; M.S., 1981, Florida State University; Ph.D., 1990, Memphis State University

M. DAVID RUDD (2013), President, Distinguished Professor of Psychology: B.A., Princeton University; M.A., Ph.D., University of Texas, Austin

HELEN J.K. SABLE (2008), Associate Chair of Educational Initiatives, Associate Professor: B.A., 1995, University of Wisconsin-Milwaukee; M.S., 1998, Kansas State University; Ph.D., 2001, University of Wisconsin-Milwaukee

ROBERT /GIOVANNI N. DORTCH (2012), Instructor: B.A. 1999, M.A. 2004, University of Memphis

GRAVES E. ENCK (1974), Associate Professor: B.A. 1961, North Texas State University; M.A., 1968, Texas Christian University; Ph.D., 1975, Yale University

CLAYTON FORDAHL (2017), Assistant Professor: B.A. 2010, The George Washington University; M.A., 2013, Ph.D., 2017, Stony Brook University (SUNY)

WESLEY L. JAMES (2009), Associate Professor: B.A., 2001, University of Missouri-Columbia; M.A., 2004, Ph.D., 2009, Mississippi State University

JOSEPH LARISCY (2015), Assistant Professor: B.A., 2007 University of Georgia; M.A., 2009, Ph.D., 2013, University of Texas at Austin

SUNAH M. LAYBOURN (2018), Assistant Professor: B.A., 2005, University of Memphis; M.A., 2014, Ph.D., 2018, University of Maryland

JENI LOFTUS (2012), Associate Professor: B.A., 1996, University of Minnesota, Twin Cities; M.A., 1999, Ph.D., 2004, Indiana University, Bloomington

KENDRA MURPHY (2012), Instructor/Coordinator: B.A., 2003, University of Central Arkansas; M.A., 2007, University of Memphis

GRETCHEN PETERSON (2016), Professor, Chair: B.A., 1995, Bates College; M.A., 1997, Ph.D., 2000, University of Arizona

CAROL RAMBO (1993), Associate Professor: B.A., 1986, M.A., 1987, Ph.D., 1993, University of Florida

DARRON T. SMITH (2017), Instructor: B.A., 1994, M.A., 2000, Ph.D., 2010, University of Utah

CYNTHIA STOCKTON (2014), Instructor: B.A., 2011, M.A., 2013, University of Memphis

JUNMIN WANG (2008), Associate Professor: B.A., 1997, M.A., 2000, Beijing University; Ph.D., 2007, New York University

### **Department of World Languages and Literatures**

#### WILLIAM JOHN THOMPSON, Ph.D., Chair

RALPH ALBANESE (1990), Professor of French: B.A., 1966, M.A., 1968, Queens College; Ph.D., 1972, Yale University

PILAR ALCALDE (1998), Associate Professor of Spanish: B.A., 1988, Universidad Complutense, Madrid, Spain; M.A., 1994, Ph.D., 1998, University of Southern California

CARLO BOTTONE (2016), Instructor of Classics and Italian: M.A., Università degli Studi di Milano, 2007; M.A., City University of New York, 2016

FERNANDO BURGOS (1981), Professor of Spanish: B.S., 1970, M.A., 1973, University of Chile; Ph.D., 1980, University of Florida

MELANIE CONROY (2013), Assistant Professor of French: B.A., 2000, University of Alberta; M.A., 2005, State University of New York; M.A., 2006, Université de Paris VIII; Ph.D., 2012, Stanford University

1371

REGAN EDWARDS (2013), Instructor of Spanish: B.A., 2006, University of Mississippi; M.A., 2013, University of Georgia

COSETTA GAUDENZI (2002), Associate Professor of Italian: Laurea, 1992, Università di Bologna; M.A., 1993, University of Warwick; Ph.D., 2000, University of Texas at Austin

INMACULADA GOMEZ SOLER (2012), Associate Professor of Spanish: B.A., 2006, University of Sevilla, Spain; M.A., 2009, Ph.D., 2012, University of North Carolina, Chapel Hill

DENIS GRELE (2007), Associate Professor of French: Licence, 1991, M.A., 1994, Université de Caen; Ph.D., 1999, New York University

JENNIFER JOHNSTON (2010), Instructor of Spanish: B.A., 1993, University of Florida; M.A., 2001, University of Memphis

PATTY JOYNER (2017), Instructor of Spanish: B.A., 2015, University of Tennessee at Martin; M.A., 2017, University of Memphis

ROBERT KELZ (2010), Associate Professor of German: B.A., 1998, Tulane University; M.A., 2006, Ph.D., 2010, Vanderbilt University

JOSÉ MAGAÑA (2016), Instructor of Spanish: B.A., 2013, M.A., 2015, University of Memphis

YUKI MATSUDA (2000), Associate Professor of Japanese: B.A., 1989, Michigan State University; M.A., 1991, University of Massachusetts; M.A., 1993, Ph.D., 1997, University of Southern California

JOSHUA NAVE (2016), Instructor of Spanish: B.A., 2004, Lee University; M.A., 2007, Louisiana State University

MONIKA NENON (1993), Professor of German: M.A., 1983, Ph.D., 1987, University of Freiburg, Germany

HIRONORI NISHI (2016), Assistant Professor of Japanese: B.A., 2003, Wasada University; B.A., 2006, Southern Oregon University; M.A., 2009, Portland State University; Ph.D., 2015, University of Wisconsin, Madison

FATIMA R. NOGUEIRA (2005), Professor of Spanish: B.,A., 1977, Pontificia Universidade Católica de Campinas; M.A., 2000, The University of Memphis; M.A., 2003, Vanderbilt University

ERROL M. O'NEILL (2008), Assistant Professor of French: B.A., 1997, Southern Illinois University at Carbondale; M.A., 2000, Ph.D., 2012, University of Illinois at Urbana-Champaign

IVAN ORTEGA-SANTOS (2008), Associate Professor of Spanish: B.A., 1999, Universidad de Deusto; M.A., 2003, University of Arizona; Ph.D., 2008, University of Maryland

HEIKE POLSTER (2007), Associate Professor of German: M.A., 2002, The University of Georgia; Ph.D., 2007, Washington University

ROBIN RASH (2012), Senior Lecturer of French and Spanish, Lambuth Campus: B.A., 1981, Northern Kentucky University; M.A., 1988, Ph.D., 1993, University of Cincinnati

DIANA RUGGIERO (2012), Associate Professor of Spanish: B.A., 2002, M.A., 2004, Ph.D., 2010, Ohio State University

LINDSEY SHELTON (2011), Instructor of Spanish: B.A., 2008, M.A., 2010, University of Memphis

BENJAMIN SPARKS (2016), Instructor of French: B.A., 2008, M.A., 2011, Brigham Young University; Ph.D., 2015, Louisiana State University

WILLIAM JOHN THOMPSON (1989), Associate Professor of French, Chair: B.A., 1983, M.A., 1984, McMaster University, Canada; Ph.D., 1989, Cornell University

VANIA BARRAZA TOLEDO (2008), Associate Professor of Spanish: B.A., 1998, Universidad Austral de Chile; M.A., 2000, Catholic University of America; Ph.D., 2005, The University of Arizona

FRANCISCO VIVAR (1996), Professor of Spanish: B.A., 1979, Universidad Complutense, Madrid, Spain; M.A., 1990, California State University; Ph.D., 1995, University of California-Los Angeles

SHINOBU WATANABE (2018), Instructor of Japanese: B.A., 2009, M.A., 2015, University of Memphis

LAN ZHANG (2007), Associate Professor of Chinese: B.A., 1997, M.A., 2000, Beijing Language University; Ph.D., 2007, University of South Carolina

KATHERINE LAMBERT-PENNINGTON, Ph.D., Chair

#### **Department of City and Regional Planning**

CHARLES SANTO, Ph.D., Chair

REZA BANAI (1983), Professor: B.Arch., 1973, Miami University; M.Arch. 1975, Virginia Polytechnic Institute; M.A., Ph.D., 1983, University of Pennsylvania

JAE TUEK CHIN (2018), Visiting Assistant Professor: B.S., 1999, Seoul National University; M.S., 2001, Seoul National University; M.C.R.P, 2009, The Ohio State University; Ph.D., 2013, The Ohio State University

ANDREW GUTHRIE (2018), Assistant Professor: B.A., 2004, University of Georgia; M.U.R.P, 2009, University of Minnesota; Ph.D., 2018, University of Minnesota

CHARLES SANTO (2005), Associate Professor, Chair: B.A., 1996, Washington and Lee University; M.U.R.P., 1999, Virginia Commonwealth University; Ph.D., 2005, Portland State University

# **Department of Criminology and Criminal Justice**

K B TURNER, Ph.D., Chair

BERT O. BURRASTON (2012), Associate Professor: B.S., 1991, M.S., 1994, Brigham Young University; Ph.D., 2003, University of Oregon

ANGELA CREWS (2013), Research Associate Professor: B.S., 1989, Tusculum College; M.A., 1992, East Tennessee State University; Ph.D., 1996, Indiana University of Pennsylvania

RANDOLPH DUPONT (2003), Professor: B.A., 1973, Loyola University of the South; Ph.D., 1981, University of Texas at Austin

AMAIA IRATZOQUI (2015), Assistant Professor, B.S., 2006, Florida International University; M.S., 2008, Florida International University; PhD, 2015 Florida State University.

AMANDA JOHNSON (2013), Associate Professor: B.A., 2002, M.P.A., 2005, University of Arizona; Ph.D., 2010, Sam Houston State University

SHERI JENKINS KEENAN (2017), Coordinator and Clinical Assistant Professor: B.A., 1996, The University of Alabama, Birmingham; B.S., 1997, The University of Alabama, Birmingham; M.S., 1998, Jacksonville State University; PhD., 2011, The University of Southern Mississippi

SHELLEY KEITH (2017), Associate Professor and Graduate Studies Coordinator: B.A., 1996, Emory University; M.S., 1999, Florida State University; Ph.D., 2009, Emory University

ANGELA MADDEN (2013), Research Associate Professor: B.S., 1989, Tusculum College; M.A., 1992, East Tennessee State University; Ph.D., 1996, Indiana University of Pennsylvania

TIMOTHY MCCUDDY (2019), Assistant Professor, BA., 2001, University of Memphis; MA 2013, University of Memphis; Ph.D., 2018. University of Missouri-St. Louis

JAMES MCCUTCHEON (2013), Associate Professor: B.A., 2008, M.A., 2010, Auburn University; Ph.D., 2013, University of Central Florida

GEORGE MEGELSH (2012), Senior Lecturer, Lambuth Campus: B.A., LaSalle University; M.A., Rider University

LAUREL MILES (2018), Undergraduate Instructor/Coordinator: B.A., 2012; University of Memphis; M.A., 2014, University of Memphis

ANDREW SENTER (2019) Undergraduate Instructor/Coordinator: B.A., 2008, University of Tennessee-Knoxville; J.D., 2012, Florida Coastal School of Law; M.A., 2017, University of Memphis

K B TURNER (2003), Associate Professor, Chair: B.S., 1983, Jackson State University; M.S., 1988, University of Nebraska at Omaha; Ph.D., 1996, University of Nebraska at Lincoln

STEPHEN WATTS (2014), Assistant Professor: B.A., 2006, University of North Caroline at Asheville; M.A., 2009, University of Georgia; PhD., 2013, University of Georgia

1373

LENARD WELLS (2013), Instructor: B.A., 1990, M.P.A., 1996, University of Wisconsin; Ph.D., Cardinal Stritch University

### **Department of Public and Nonprofit Administration**

SHARON WROBEL, Ph.D., Chair

DAVID N. COX (1978), Professor Emeritus: B.A., 1965, Ball State University; M.A., 1968, University of Queensland; Ph.D., 1977, Indiana University

ELIZABETH GILLESPIE (2020), Assistant Professor: B.A., 2005, University of Iowa; MPA, 2014, Drake University; Ph.D., 2020, University of Nebraska at Omaha

JOSEPH HAFER (2020), Assistant Professor: B.A., 2004, Millersville University of Pennsylvania; M.S., 2009, Villanova University; Ph.D., 2019, Pennsylvania State University Harrisburg

MICHAEL HOWELL-MORONEY (2012), Professor: B.S., 1004, Northern Arizona University; M.B.A., 1998, Eastern University; Ph.D., 2002, University of Delaware

ERIN K. NELSON (2013), Assistant Professor: B.A., 2000, University of Pittsburgh; M.P.A., 2006, Ph.D., 2013, University of Missouri-Kansas City

JOHN TOPINKA (2013), Clinical Assistant Professor: B.A., 1974, University of Wisconsin-Madison; M.A., 1976; M.P.A., 1983, University of Wisconsin-La Crosse; Ph.D., 2011, Florida International University

CANDACE McRAE WALSH (2014), Instructor: B.S., 1989, University of Tennessee at Knoxville; M.P.A., 1999, University of Tennessee at Chattanooga

SHARON WROBEL (2010), Associate Professor, Department Chair: B.A., 1991, M.P.A., 1995, Arizona State University; M.S., 2000, Ph.D., 2005, University of Texas-Dallas

## **School of Social Work**

SUSAN NEELY-BARNES, Ph.D., Chair, Director

KATIE K. NORWOOD (2018), Instructor, Coordinator: B.S., 1999, University of Tennessee Knoxville: M.S.S.W., 2006, University of Tennessee Knoxville

KENYA ANDERSON (2013), Clinical Assistant Professor: B.A., 2000, University of Memphis; M.S.W., 2010, University of Tennessee-Knoxville

ELENA DELAVEGA (2011), Associate Professor: B.A., 2006, University of Houston-Downtown; M.S.W., 2008, Ph.D., 2010 University of Houston

SUSAN ELSWICK (2012), Assistant Professor: B.A., 2001, Coastal Carolina University; M.S.S.W, 2006, University of Tennessee; Ed.D., 2011, University of Memphis

MELISSA HIRSCHI (2017), Assistant Professor: B.S., 2001 Brigham Young University; M.S.W., 2007, Ph.D., 2017, Boston University

SEOK WON JIN (2018), Assistant Professor: B.A., 1995, Yonsei University; M.A., 2006, Kyung Hee University; M.A., 2008, Ball State University; M.S.W., 2011, University of Minnesota; Ph.D., 2013, University of Minnesota

MARGARET ANN LANDRY (2018), Instructor/Coordinator: B.A., 2012; M.S.W., 2014, University of Memphis.

ROBIN LENNON-DEARING (2010), Associate Professor: B.S.W., 1996, M.S.W., 1998, University of South Florida; Ph.D., 2004 University of Georgia

CHERRY MALONE (2016), Instructor/Coordinator: B.A., 1997, University of Memphis; M.S.W., 2011, University of Tennessee, Knoxville

VERONICA MORROW (2014), Lecturer, Lambuth Campus: B.A., 1993, University of Memphis; M.S.W., 2012, Union University

SUSAN NEELY-BARNES (2010), Professor, Chair: B.A., 1996, Duke University; M.S.W., 1999, Washington University; Ph.D., 2005, University of Washington

1374

BRANDON OUSLEY (2015), Instructor/Coordinator: B.S., 2007, University of Alabama at Birmingham; M.S.W., 2008, Loyola University Chicago

LAURA TAYLOR (2011) Assistant Professor: B.A., 1995, University of Illinois at Champaign-Urbana; M.S.W., 1997 Loyola University – Chicago; Ph.D., 2017, Institute for Clinical Social Work

GREGORY WASHINGTON (2009), Professor: B.S., 1982, University of Illinois Urbana-Champaign; M.S., 1995, Chicago State University; M.S.W., 1999, Ph.D., 2003 Clark Atlanta University

JERRY WATSON (2018), Assistant Professor, B.A. Program Coordinator: B.A., 1993, Northeastern Illinois University; M.S.W., 1997, University of Illinois; M.B.A., 2003, Dominican University; Ph.D., 2006, Jackson State University

# **Fogelman College of Business & Economics Faculty and Staff**

DAMON FLEMING, Ph.D., Dean CHARLES A. PIERCE, Ph.D., Associate Dean for Academic Programs and Research

CHEN ZHANG, Ph.D., Associate Dean for Faculty and Administration TRELLIS M. MORGAN, M.S., Manager, Undergraduate Student Services MARK E. ALPUENTE, M.A., Assistant Manager, Undergraduate Student Services, Graduation Analyst/Academic Advisor TINESE H. HARRIS, Administrative Secretary ELIZABETH A. JASPER, M.S.W., Academic Advisor MARY J. JOHNSON, B.S.Ed., Honors Student Advisor/Scheduling Coordinator

APRIL JONES, M.B.A., Academic Advisor

W. RYAN MITCHELL, M.A., Academic Advisor FELICIA RODDY-JACKSON, M.A.L.S., Scholarship/Recruitment Coordinator

Accountancy

KENTON B. WALKER, Ph.D., Director

PHILIP D. BABIN (2015), Instructor: B.S., 1982, Christian Brothers College, M.B.A., 2004, The University of Memphis, C.M.A., C.P.A., Tennessee

JOSHUA A. COYNE (2014), Assistant Professor: B.S., M.Acc., 2010, Brigham Young University; Ph.D., 2014, University of North Carolina, Chapel Hill

DAMON FLEMING (2019), Professor, Dean: B.S., 2001, M.S., 2003, San Diego State University, Ph.D., 2006, Virginia Polytechnic Institute and State University

NAN GOLDEN (2015), Assistant Professor: B.C., 2007, Macquarie University; M.S., 2009 Michigan State University; Ph.D., 2015, Florida Atlantic University

RITA GREEN (2016), Instructor: B.S., 1992, University of Tennessee at Martin; M.B.A., 1997, Ed.D., 2012, The University of Memphis

HYUNGCHUL KIM (2015), Assistant Professor: B.S., 2011, M.S., 2011, Brigham Young University; Ph.D., 2015, Texas Tech University KENNETH R. LAMBERT (1982), Professor: B.S.B.A. 1968, Southeast Missouri State University; M.B.A., 1972, Ph.D. 1976, University of Arkansas

STEVE LIN (2019), Professor, James T. Thompson Chair for Excellence in Accounting Education: B.A. 1987, Soochow University, M.A., 1991, Lancaster University, Ph.D., 1999, the Victoria University of Manchester

JAMES M. LUKAWITZ (1989), Associate Professor: B.S., 1983, Ph.D., 1989, Florida State University; C.P.A., 1985, Florida

JOHN M. MALLOY (1988), Professor: B.B.A., 1961, M.B.A., 1966, Southern Methodist University; Ph.D., 1970, Louisiana State University; J.D., 1974, Salmon P. Chase School of Law of North Kentucky University; C.P.A., 1965, Texas; Member of Ohio Bar, 1974

PETER L. McMICKLE (1978), Professor: B.B.A. 1967, Memphis State University; M.A., 1969; Ph.D., 1977, University of Alabama; C.P.A., 1970, Tennessee

LARRY MOORE (1987), Professor: B.A., 1971, Vanderbilt University; M.A., 1974, Memphis State University; J.D., 1976, Washington University

1375

ZABIHOLLAH REZAEE (2001), Professor and Thompson-Hill Chair of Excellence in Accounting: B.S., 1976, Iranian Institute of Advanced Accounting; M.B.A., 1980, Tarleton State University; Ph.D., 1985, University of Mississippi

KATHERINE B. SORENSEN (2017), Assistant Professor; B.S.B.A., 2008 University of Tennessee; M.Acc., 2009 University of Tennessee; Ph.D., 2017, Southern Illinois University

IRVIN LEE TANKERSLEY (1973), Associate Professor: B.B.A., 1967, Memphis State University; J.D., 1972, Tulane University KENTON B. WALKER (2014), Professor, Director: B.B.A., 1974, M.S., 1978, University of Wisconsin-Whitewater; Ph.D., Texas A&M University

JOSEPH H. ZHANG (2012), Associate Professor: B.S., 1996, Zhejiang University; M.S., 2004, M.A., 2006, University of Illinois; Ph.D., 2012, Louisiana State University; C.P.A.

# **Business Information and Technology**

SANDRA M. RICHARDSON, Ph.D., Interim Chair

ALI MAHDAVI ADELI (2017), Assistant Professor: B.Sc. 2007, Semnan University; M.Sc., 2010 University of Technology Malaysia, Ph.D., 2017, University of Minnesota

JUDITH COMPTON BROWN (1964), Assistant Professor: B.B.A., 1961, Memphis State University; M.S., 1962, University of Tennessee JASBIR S. DHALIWAL (2005), Professor, Executive Vice President for Research and Innovation: B.S., 1982, University of Malaya; M.B.A., 1986, Ph.D., 1993, University of British Columbia

MARK L. GILLENSON (1995), Professor: B.S., 1969, Rensselaer Polytechnic Institute; M.S., 1970, Ph.D., 1974, The Ohio State University BRIAN D. JANZ (1995), Professor: B.E.E., 1984, M.B.A., 1987, Ph.D., 1995, University of Minnesota

EUNTAE TED LEE (1999), Associate Professor: B.S., 1984, Seoul National University; M.S., 1989, The Pennsylvania State University; Ph.D., 1996, University of Nebraska

HUIGANG LIANG (2019), Professor and FedEx Chair of Excellence in MIS: B.S., 1995, M.S., 1998, China Pharmaceutical University, M.S., 2002, Auburn University, Ph.D., 2003, Auburn University MOHAMMAD S. NAJJAR (2020), Instructor: B.S., 2002, M.B.A. 2007, University of Jordan, Ph.D., 2014, University of Memphis

AVANTI PANDIT (2019), Instructor: B.Com, 1983, University of Delhi, M.S. 2002, M.B.A. 2002, Boston University ROBIN SUZANNE POSTON (2003), Professor, Graduate School Dean: B.S., 1987, University of Pennsylvania; M.S., 1992, University of Central Florida; Ph.D., 2003, Michigan State University

SANDRA M. RICHARDSON (2006), Associate Professor, Interim Chair: B.S., 1997, University of New Mexico; M.S., 2002, Texas Tech University; Ph.D., 2006, University of Central Florida

MARGARET R. SCHULTZ (2007), Instructor: B.A., 1979, University of Toledo; M.B.A., 1982, Cleveland State University; Ph.D., 2004, The University of Memphis

SRIKAR VELICHETY (2016), Assistant Professor: B. Tech., 2007, M. Tech., 2009, Indian Institute of Information Technology and Management; Ph.D., 2016, University of Arizona

YINAN YU (2019), Assistant Professor: B.S., 2010 Tongji University, M.S., 2012, Tsinghua University, Ph.D., 2017, The University of Hong Kong CHEN ZHANG (2007), Associate Professor, Associate Dean for Faculty and Administration: B.A., 1998 Beijing Normal University; M.B.A., 2000, Bowling Green State University; M.S., 2002, Wright State University; Ph.D., 2008, Purdue University

# Economics

WILLIAM T. SMITH, Ph.D., Chair

CARMEN ASTORNE-FIGARI (2012), Associate Professor: B.S., 2002, Universidad del Pacifico; M.A., 2008, Ph.D., 2012, Washington University in St. Louis

CARL MAGNUS BJUGGREN (2019): B.A., 2006, M.A., 2006, Lund University, Ph.D., 2013, Linkoping University

JAMEIN P. CUNNINGHAM (2017), Assistant Professor: B.A., 2006 Michigan State University; M.S., 2008, University of North Texas; Ph.D., 2014, University of Michigan

JOHN E. GNUSCHKE (1976), Professor; Director, Center for Manpower Studies and Bureau of Business and Economic Research: B.S., 1969, Utah

State University; M.A., 1971, Ph.D., 1975, University of Missouri
ANDREW J. HUSSEY (2006), Associate Professor: B.A., 2000, St. Olaf University; M.A., 2001, Ph.D., 2006, Duke University
DAVID M. KEMME (1994), Professor, Shelby County / William N. Morris Chair of Excellence in International Economics: B.A., 1973, Miami
University; M.A., 1975, Ph.D., 1980, Ohio State University
JOONHYUNG LEE (2012), Associate Professor: B.A., 2002, Korea University; Ph.D., 2009, University of Texas at Austin
JOSE JOAQUIN LOPEZ (2014), Assistant Professor: B.A., 2002, Universidad Autonoma de Nuevo, Mexico; Ph.D., 2014, The University of

Chicago ALBERT A. OKUNADE (1987), Professor: B.S., 1980; M.S., M.B.A., 1982, Wright State University; Ph.D., 1986, University of Arkansas

SUMANT RAI (2016), Instructor: B.A., 2000, University of Delhi; M.A., 2002, Delhi School of Economics; Ph.D., 2012, University of Washington WILLIAM T. SMITH (1993), Professor, Chair: B.A., 1979, American College in Paris; M.A., 1980, University of Miami; Ph.D., 1987, University of Virginia

JAMIN D. SPEER (2014), Assistant Professor: B.A., 2007, Vanderbilt University; M.A., 2009, M.Phil., 2011, Ph.D., 2014, Yale University

# **Finance, Insurance and Real Estate**

PANKAJ K. JAIN, Ph.D., Interim Chair

KELLEY ANDERSON (2017), Instructor: B.S., Middle Tennessee State University; ABD, The University of Memphis

JEFFREY R. BLACK (2017), Assistant Professor: B.S., 2010, M.S., 2012, Colorado State University; Ph.D., 2017, University of Oklahoma

ALLEN CARRION (2018), Assistant Professor: B.S., 1993, Virginia Technological University; M.B.A., 2003, University of Maryland; Ph.D., 2012, University of Utah

QUENTIN C. CHU (1984), Professor: B.S., 1977, National Chiao Tung University; M.A.S., 1979, Ph.D., 1984, University of Illinois PANKAJ K. JAIN (2002), Professor, Interim Chair: B.Com., 1993 Rajasthan University, India; M.B.A., 1995, Indian Institute of Management: L.LB., 1998, Bombay University; M.S., 2000, Ph.D., 2002, Indiana University

LESLIE R. MATHIS (2000), Instructor: B.A., 1983, Vanderbilt University; M.I.M., 1986 Thunderbird-Garvin School of International Management; M.A., 1997, University of New Orleans

THOMAS H. McINISH (1990), Professor, Wunderlich Chair of Excellence in Finance: B.A., 1968, Birmingham-Southern College; M.A., 1971, American University; Ph.D., 1978, University of Pittsburgh

NAPOLEAN H. OVERTON (2010), Instructor: B.S., 1980 University of Tennessee at Knoxville; M.B.A., 1982, The University of Memphis

ALLISON POTTER (2020), Instructor: B.S., 1986, University of Memphis, M.B.A., 1988, Arkansas State University, Ph.D., 2004, University of Memphis

SILVERI SAVATINO (2015), Assistant Professor: M.Comm, 2001, University of Melbourne; M.S., 2005, University of Rochester; Ph.D., 2009, Arizona State University

VIVEK SHARMA (2016), Instructor: B.Sc., 2005, Presidency College; M.S., 2005, Indian Statistical Institute; ABD, The University of Memphis

KONSTANTIN SOKOLOV (2018), Assistant Professor: M.Sc. 2009, St. Petersburg State University; Ph.D., 2017, Wilfrid Laurier University RONALD W. SPAHR (2005), Professor: B.S.M.E., 1966, South Dakota State University; M.B.A., 1969, University of Southern California; Ph.D., 1976, University of Wisconsin

MARK A. SUNDERMAN (2008), Morris F. Fogelman Chair of Excellence in Real Estate: B.S., 1974, M.S., 1976, Ph.D., 1986, University of Illinois at Urban-Champaign

# Management

KURT KRAIGER, Ph.D., Chair

LAURA L. ALDERSON (1999), Instructor: B.B.A., 1989, M.B.A., 1992, University of Mississippi, Ph. D. 2018, University of Memphis

WENDY L. BEDWELL (2019), Instructor: B.A. James Madison University, M.D.E. University of Maryland, Ph.D., 2012, University of Central Florida

V. CAROL DANEHOWER (1989), Associate Professor: B.A. 1977, Hendrix College; M.A., 1978, University of Arkansas; D.B.A., 1987, University of Kentucky

BARBARA D. DAVIS (1994), Associate Professor: B.S. 1974, Knoxville College; M.A., 1975, University of Kentucky; Ed.D., 1990, Memphis State University

FRANCES H. FABIAN (2008), Associate Professor: A.B., 1983 Smith College; M.P.P., 1985, Harvard University; Ph.D., 1997, University of Texas at Austin

1377

KRISTEN P. JONES (2016), Assistant Professor: B.A., 2008 University of Virginia; M.A., 2010, Ph.D., 2013 George Mason University

JESSICA KIRK (2019), Assistant Professor: B.A., University of Missouri, M.B.A., Washington University, Ph.D., 2019, The University of Colorado

KURT KRAIGER (2019), Professor, Chair: B.A., 1979, University of Cincinnati; M.A., 1982, M.S., 1982, Ph.D., 1983, Ohio State University

ALEX P. LINDSEY (2018), Assistant Professor: B.S., 2011, Purdue University Indianapolis; M.A., 2013, Ph.D., 2016, George Mason University

KELLY A. MOLLICA (2007), Instructor: B.S., 1983, Western Carolina University; M.S., 1989, University of Tennessee at Knoxville; Ph.D., 1997, The Pennsylvania State University

CHARLES A. PIERCE (2004), Professor, Associate Dean for Academic Programs and Research: B.S. 1990, Syracuse University; M.A., 1992, Ph.D., 1995, University at Albany, State University of New York

CAITLIN PORTER (2019), Assistant Professor: B.S., B. A., 2010, University of Central Arkansas, M.S., 2013, Ph.D. 2016 Purdue University MARTHA D. ROBINSON (2007), Instructor: B.S., 1978, M.B.A., 1991, Tennessee State University; Ed.D., 2004, Vanderbilt University

ENRICA RUGGS (2019), Assistant Professor: B.S., 2005, Prairie View A & M Unviersity, M.S. 2007, St. Mary's University, Ph.D. 2013, Rice University

KATHY A. TUBERVILLE (2012), Instructor: B.S., 1978, M.S., 1982, The University of Memphis; Ed.D., 2014, Northcentral University ROBERT ROEBUCK WIGGINS (2002), Associate Professor: A.B., 1975, Vassar College; M.B.A., 1977, Ph.D., 1995, University of Texas at Austin

# Marketing and Supply Chain Management

GREGORY W. BOLLER, Ph.D., Interim Chair

M. MEHDI AMINI (1988), Professor: B.A., 1976, Tehran University; M.B.A., 1979, University of North Texas; M.S., 1984, Ph.D., 1989, Southern Methodist University

WENDY BEDWELL (2019), Instructor: B.A., James Madison University, M.D.E., University of Maryland, Ph.D., 2012, University of Central Florida

GREGORY W. BOLLER (1988), Associate Professor, Interim Chair: B.S., 1982, M.S., 1984, Ph.D., 1988, The Pennsylvania State University ALAN J. BUSH (1988), Professor: B.A., 1976, Winona State University, M.B.A., 1978, Ph.D., 1983, Louisiana State University MICHAEL J. CERVETTI (2007), Instructor: B.S., 1976, M.S., 1978, Ed.D., 1984, The University of Memphis

ORRIN COOPER (2012), Assistant Professor: B.A., 2004, Utah Valley University; M.P.A., 2007, Brigham Young University; Ph.D., 2012, University of Pittsburgh

TRACY A. COSENZA (2013), Instructor: B.S., 2003, Christian Brothers University; M.B.A., 2005, The University of Memphis; Ph.D., 2010, Auburn University

GEORGE D. DEITZ (2005), Associate Professor: B.A. 1988, B.S., 1988, M.S., 1991, West Virginia University, Ph.D., 2005, University of Alabama

BRADFORD R. EICHHORN (2015), Instructor: B.S., 1975, M.S. 1977, Ph.D., 2014, Cleveland State University RAJIV GROVER (2007), Professor, Sales and Marketing Chair of Excellence: B.Tech., 1975, M.B.A., 1977, Indian Institute of Technology; Ph.D., 1983, University of Massachusetts

DALE F. KEHR (2000), Instructor: B.S.B., 1968, Emporia State University; M.B.A., 1971, Wichita State University

BALAJI C. KRISHNAN (1999), Professor, Director of M.B.A. Programs: B.S., 1989, Marathwada University; M.M.S., 1991, University of Bombay; Ph.D., 1998, Louisiana State University

GENSHENG LIU (2006), Associate Professor: B.Engr., 1996, M.Engr., 1998, Tsinghua University; Ph.D., 2007, University of Minnesota SATISH MEHRA (1978), Professor: B.Sc., 1966, University of Delhi; B.ENGG., 1969, University of Poona; M.B.A, 1972, Ph.D., 1978, University of Georgia

ERNEST L. NICHOLS (1991), Associate Professor: B.A., 1980, University of Maine at Orono; M.B.A., 1985, Ph.D., 1993, Michigan State University

MICHAEL J. RACER (2004), Associate Professor: B.A., 1984, Rice University, M.S., 1986, Ph.D., 1990, University of California - Berkeley. JEFFREY R. THIEME (2003), Associate Professor: B.S., 1989, M.B.A., 1992, University of Missouri - Columbia, Ph.D., 1998, Michigan State University

1378 ADRIENNE ZAITZ (2011), Instructor: B.A., 1972, City University of New York; M.A., 1977, New York University; M.B.A., 1981, Adelphi University

# **College of Communication and Fine Arts Faculty and Staff**

ANNE HOGAN, Ph.D., Dean

RYAN FISHER, Ph.D., Associate Dean for Academic Affairs

RIKA HUDSON, M.A., Academic Success Advisor

LAURA SNYDER, M.A., College Academic Advisor II

TERRELL STANFORD-BUSH, M.A., College Academic Advisor I

## Architecture

MICHAEL HAGGE, M.Arch., Chair

BRIAN ANDREWS (2020), Visiting Professor of Architecture: M. Arch., Princeton University; B. Arch., Tulane University

JENNIFER BARKER (2013), Associate Professor: M.Arch., The University of Memphis; B.Arch., University of Tennessee

SHERRY BRYAN (1984), Professor Emeritus: M. Arch., Virginia Polytechnic Institute; M.S., Memphis State University; B.S., Memphis State University

MICHAEL CHISAMORE (2009), Associate Professor: M.Arch., Virginia Polytechnic Institute; B.P.S. (Architecture), State University of New York at Buffalo

MICHAEL HAGGE (1996), Professor: M.Arch., Virginia Polytechnic Institute; M.C.R.P., Memphis State University; M.P.A., Webster College (Government Service Fellowship)

PAMELA HURLEY (2011), Visiting Professor of Architecture: M.Arch., The University of Memphis; MFA, University of Tennessee; BFA (Design), Parsons School of Design; BFA (Interior Architecture), The University of Memphis

ANDREW PARKS (2009), Instructor: M.Arch., University of Tennessee; B.F.A. (Architecture), The University of Memphis; B.S.E.T (Arch), The University of Memphis

MARKIA SNIDER (2020), Assistant Professor: M.Arch., University of Kansas; Ph.D. (History, Architecture and Urbanism), University of Utah; Master of Design Studies (Historic Preservation), Boston Architectural College; B.S. (Architecture), The Ohio State University

JENNIFER "JENNA". THOMPSON (2013), Associate Professor: M.Arch., The University of Memphis; B.Arch., Auburn University; B.I.Arch., Auburn University

ANDY KITSINGER (2010), Director UofM Design Collaborative + Visiting Professor: B.Arch., University of Arkansas; M.C.R.P., The University of Memphis

### **Professional Staff**

ANNE BALLUM (2019), Administrative Associate II; M.B.A, Tulane University; M.S. Chapman University; B.A., University of New Orleans; B.A., The University of Memphis

# Art

RICHARD A. LOU, M.F.A., Chair

FRED C. ALBERTSON (1987), Professor: B.A., 1974, University of California-Irvine; M.A., 1977, Ph.D., 1980, Bryn Mawr College
BRYNA BOBICK (2008), Associate Professor: B.F.A., 1997, Ed.D., 2008, University of Georgia
LUCAS A. CHARLES (2002), Associate Professor: B.A., 1998, University of Tennessee; M.G.D., 2002, North Caroline State University
LORELEI H. CORCORAN (1990), Professor: B.A., 1975, Tufts University; Ph.D., 1988, University of Chicago
ELIZABETH I. EDWARDS (2000), Professor: B.F.A., 1982, Tyler School of Art; M.F.A., 1987, Indiana University
GARY K. GOLIGHTLY (2002), Associate Professor: B.B.A., 1984, M.F.A., 1995, Memphis State University
JAMES E. JACKSON (1999), Professor: B.F.A., 1977, Memphis College of Art; M.F.A., 1980, Cornell University
EARNESTINE L. JENKINS (2000), Professor: B.A., 1979, Spelman College; M.A., 1986, Memphis State University; Ph.D., 1997, Michigan State
University
RICHARD A. LOU (2007), Professor, Chair: B.A., 1983, California State University; M.F.A, 1986, Clemson University
WILLIAM McKEOWN (2005), Associate Professor; B.A., 1994, University of West Floridia; M.A., 1996, State University of New York at Stony

Brook; Ph.D., 2005, Florida State University
GREELY L. MYATT (1989), Professor: B.F.A., 1975, Delta State University; M.F.A., 1980, University of Mississippi
MICHAEL R. SCHMIDT (1995), Associate Professor: B.F.A., 1992, Ohio University; M.F.A., 1994, North Carolina State University
H. WAYNE SIMPKINS (1974), Associate Professor: B.F.A., 1970, Carnegie-Mellon University; M.F.A., 1974, University of California-Santa Barbara

### **Professional Staff**

DAVID HORAN (1986), Instructor: B.L.S., 1994, University of Memphis LESLIE L. LUEBBERS (1990), Art Museum Director: B.A., 1967, Wellesley College; M.A.T., 1969, Johns Hopkins University; M.A., 1987, Institute of Fine Arts, New York University; M.S., 1990, Graduate School of Administration, New York University PATRICIA V. PODORSKI (2001), Curator of Education, Institute of Egyptian Art and Archaeology: B.A., 1978, Washington State University; M.A., 1982, Ph.D., 1994, University of California at Berkeley

# Communication

DAVID L. APPLEBY, Professor (M.F.A., Temple University) Film and Video Production; Cinematography; Documentary History and Theory

WENDY ATKINS-SAYRE, Department Chair (Ph.D. University of Georgia) Rhetoric, Social Movements and Animal Rights, and Women and the Media

ANTONIO DE VELASCO, Associate Professor (Ph.D., Emory University) Rhetoric and Social Theory; U.S. Political Discourse; Rhetorical Pedagogy

AMANDA NELL EDGAR, Assistant Professor (Ph.D., University of Missouri) Media Studies and Rhetoric

ROXANA L. GEE, Associate Professor (M.A., University of Memphis) Video and Film Production

JOY V. GOLDSMITH, Professor (Ph.D., University of Oklahoma) Health literacy; Health intervention development; Caregiver training; Oncology and chronic care

DAVID GOODMAN, Assistant Professor (MFA, University of North Texas) Film and Video Production

M. ALLISON GRAHAM, Professor (Ph.D., University of Florida) Media History, Theory, and Criticism; Southern Studies

DENIS GRIMES, Lecturer - Lambuth Campus (Ph.D., University of Wisconsin-Milwaukee) Communication Generalist

KATHERINE G. HENDRIX, Professor (Ph.D., University of Washington) Qualitative Research Methods; Instructional, Intercultural and Interpersonal Communication ANDRE E. JOHNSON, Associate Professor (Ph.D., University of Memphis) African-American Rhetoric

MARINA LEVINA, Associate Professor and Director of Graduate Studies (Ph.D., University of Illinois) Critical Cultural Studies; Media Studies

D. GRAY MATTHEWS, Assistant Professor (Ph.D., Pennsylvania State University) Rhetorical Criticism; Rhetoric, Community, and Social Change

CHRISTINA MOSS, Assistant Professor (Ph.D., Louisiana State University) Southern Rhetoric; Visual and Material Commemoration

STEVEN J. ROSS, Professor (M.A., New York University) Film/Video Production; Screen Writing; Film History

LORI STALLINGS, Instructor and Director of 2381 (M.A., Marquette University) Oral Communication; Interpersonal Communication

CRAIG O. STEWART, Associate Professor and Undergraduate Coordinator (Ph.D., Carnegie Mellon University) Critical Discourse Studies; Science Communication; Research Methods

SACHIKO TERUI, Assistant Professor (Ph.D., University of Oklahoma) Health Communication

CICELY WILSON, Online Instructor/Coordinator (Ph.D., University of Memphis)

AMANDA J. YOUNG, Associate Professor (Ph.D., Carnegie Mellon University)

#### Journalism and Strategic Media

#### M. DAVID ARANT, Ph.D., Chair

M. DAVID ARANT (1992), Professor, Chair: B.A., 1975, Davidson College; M. Div., 1978, Emory University; M.A., 1989, University of South Carolina; Ph.D., 1994, University of North Carolina

ROBERT D. BYRD, Jr. (2015), Assistant Professor: B.A., 2002, Mississippi State University; M.A., 2011, University of South Alabama; Ph.D., 2014, University of Southern Mississippi

TORI M. CLIFF (2013), Instructor/Coordinator: B.S., 2004, Middle Tennessee State University; M.A., 2010, University of Memphis

TERESSA DEL ROSSO (2018), Assistant Professor: B.A., 2006, University of Wisconsin-La Crosse; M.A., 2012, Syracuse University; Ph.D., 2016, University of Oregon

PAMELA DENNEY (2011), Instructor: B.A., 1976, Syracuse University; M.A., 1994, University of Memphis.

JOHN GILMORE (2019), Assistant Professor: B.S., 2001, Middle Tennessee State University; M.A., 2018, University of Alabama

MATTHEW J. HAUGHT (2013), Associate Professor: B.A., 2007, M.A.J., 2010, Marshall University; Ph.D., 2014, University of South Carolina

JOSEPH HAYDEN (2003), Professor: B.A., 1985, Centre College; M.A., 1991, Vanderbilt University; Ph.D., 2002, Indiana University

THOMAS J. HRACH (2008), Associate Professor: B.A., 1985, University of Michigan; M.A., 1990, Kent State University; Ph.D., 2008, Ohio University

MELISSA JANOSKE MCLEAN (2014), Associate Professor: B.S., 2004, M.S., 2006, Radford University; Ph.D., 2014, University of Maryland.

CANDACE C. JUSTICE (1992), Assistant Professor: B.A., 1973, University of Mississippi; M.A., 1992, Memphis State University

KIM MARKS MALONE (2015), Instructor/Coordinator: B.A., 1993, Roger Williams College; M.A., 2006, San Diego State University

JOEL NICHOLS (2019), Assistant Professor: B.A., 1990, Memphis State University; M.B.A., 2003, Union University.

OTIS LAMAR SANFORD (2011), Hardin Chair of Excellence in Economic and Managerial Journalism: B.A., 1975, University of Mississippi

RUOXU WANG (2017), Assistant Professor: B.A., 2010, M.A., 2013, North Dakota State University; Ph.D., 2017, The Pennsylvania State University

JIN YANG (2002), Professor: B.A., 1986, Shanxi University; M.A., 1999, Pittsburg State University; Ph.D., 2004, Southern Illinois University

### Music

Michelle Vigneau, M.M.

LILY AFSHAR (1989), Professor: B.M., 1981, Boston Conservatory; M.M., 1983, New England Conservatory of Music; D.M., 1989, Florida State University

MARCIN ARENDT (2014) B.M. B.A., 2003, Stetson University; M.M., 2006, University of Colorado at Boulder; Artist Diploma, 2007, Stanislaw Moniuszko Academy of Music, Gdansk, Poland; DMA, 2010, University of Colorado at Boulder

JOHN BAUR (1979), Professor: B.M., 1969, M.M., 1970, D.M.A., 1977, College Conservatory of Music, University of Cincinnati

ELISE BLATCHFORD (2013), Assistant Professor: B.M., 2005, Oberlin Conservatory of Music, M.M., 2007, San Francisco Conservatory of Music

CATHAL BRESLIN (2013), Assistant Professor: B.Mus., 2001, Royal College of Music, London, M.M., 2004, Royal Northern College of Music, Manchester, D.M.A., 2008, University of Michigan, Ann Arbor

JOHN J. CHIEGO (1979), Professor, Director: B.A., 1975, Montclair State College; M.M., 1979, Northwestern University

JEFF W. CLINE (1998), Associate Professor, Recording Studio Manager: B.S., 1991, Depaul University; M.M., 1995, Northwestern University

JOHN THOMAS COOPER (1998), Associate Professor: B.A., 1987, M.A., 1989 California State University, Los Angeles; D.M., University of Texas, Austin

LAWRENCE EDWARDS (1987), Professor: B.A., 1971, Seattle Pacific University; M.S., 1971, Ed.D., 1986, University of Illinois

HARVEY FELDER III, (2018) Associate Professor: B.M. 1977, University of Wisconsin-Madison; M.M. 1982, University of Michigan; Spec. 1982; University of Michigan.

KYLE FERRELL (2014), Assistant Professor: M.M., 2003, Florida State University, D.M., 2005, Florida State University

RYAN FISHER (2013), Assistant Professor: B.M.E., 2000, Lee University, M.M., 2005, University of North Texas, Ph.D., 2008, University of North Texas

JONATHAN FRAZER (2002), Associate Professor: B.A., 1987, Michigan State University

HYERY HWANG (2018), Assistant Professor: B.M., 1993, Ewha Womens University, Seoul, Korea; M.M., 2001, Eastman School of Music; Post-Graduate Diploma, 2008, M.M., 2010, Royal Conservatoire of Scotland, Glasgow, UK.

KAMRAN N. INCE (1992), Professor: B.M., 1982, Oberlin Conservatory; M.M., 1984, D.M.A., 1987, Eastman School of Music ROBYN JONES (2012), Associate Professor: B.M., 1996, Indiana University, M.M., 1998, Florida State University, D.M.A., 2008, University of Minnesota

HEATHER KLOSSNER (2016), Assistant Professor: B.M.Ed., 1985, Texas Lutheran College; M.M., 1994, Texas State University; Ph.D., 2018, Eastman School of Music University of Rochester

KENNETH RICHARD KREITNER (1990), Professor: B.A., 1978, Bucknell University; M.A., 1981, Ohio State University; M.A., 1984, Ph.D., Duke University

ARTINA MCCAIN (2016), Assistant Professor: B.M., 1999, Southern Methodist University; M.M., 2003 Cleveland Institute of Music; D.M.A, 2011, University of Texas at Austin

JOHN MUELLER (2001), Associate Professor: B.A., 1981, University of Illinois-Urbana; M.M., 1985, D.M.A., 1998, The Catholic University of America

1382

ALBERT NGUYEN (2008), Associate Professor; Director of Bands: B.A., 1999, Arkansas Tech University; M.M., 2006, D.M.A., 2008 University of Texas at Austin

JEREMY OROSZ (2014), Assistant Professor:, B.A., 2005, College of Wooster, M.A., 2011, University of Minnesota, Ph.D., 2014, University of Minnesota

SUSAN OWEN-LEINERT (2005), Associate Professor: B.M., 1980, East Carolina University, M.M., 1983, University of Texas, Austin

JANET PAGE (1998), Professor: B.M., 1979, Queen's University; M.M., 1982, University of Toronto; Advanced Studies Program, 1982-83, Banff School of Fine Arts; M.A., 1986, University of British Columbia; Ph.D., 1993, Duke University

KIMBERLY PATTERSON (2016), Assistant Professor: B.M., 2007, Cleveland Institute of Music, M.M., 2009, The Juilliard School, D.M.A., 2012, University of Colorado at Boulder

WILL PLENK (2017), Assistant Professor: B.M., 2006, Ithaca College; M.M., 2008, D.M.A., 2011 University of California Los Angeles

DANIEL PHILLIPS (1999), Associate Professor: B.M., 1976, Michigan State University; M.M., 1979, University of Notre Dame

KEVIN RICHMOND (2007), Associate Professor: B.M., 1984, University of Wisconsin-Madison; M.M., 1999, D.M.A., 2003 University of Texas at Austin

RANDAL JAMES RUSHING (1990), Professor, Director: B.A., 1979, Arkansas Tech. University; M.M.E., 1982, University of North Texas; D.M.A., 2002, University of North Texas

KEVIN SANDERS (2008), Associate Professor: B.M., 2002, Indiana University; M.M., 2004, Julliard School

LEONARD A. SCHRANZE (1994), Professor: B.M., 1981, Eastman School of Music, University of Rochester; M.M., 1983, New England Conservatory

WILLIAM SHALTIS (2016), Assistant Professor: B.M., 2004, Michigan State University; M.M., 2006, Boston Conservatory; D.M.A., 2015, University of Missouri-Kansas City Conservatory of Music

TIMOTHY SHIU (2003), Associate Professor: Graduate Performance Diploma, 1994, Peabody Conservatory of Music, Professional Studies Diploma, (1992), Cleveland Institute of Music, M.M., 1991, Cleaveland Institute of Music

SAM SHOUP (2011), Assistant Professor: B.M., 1979, Memphis State University; M.M. 2017, University of Memphis

MICHAEL SHULTS (2018) Assistant Professor; BM Jazz and Studio Music, University of Missouri, Kansas City 2010; BM Saxophone Performance, UMKC 2010; MM Jazz Studies, University of Cincinnati College-Conservatory of Music 2012; DMA Saxophone Performance, UMKC 2015

BENJAMIN SMITH (2015), Assistant Professor: B.M., 1999, University of Cincinnati-College Conservatory of Music, M.M., 2003, University of Cincinnati-College Conservatory of Music, M.F.A, 2007, University of Cincinnati-College Conservatory of Music

DAVID SPENCER (1993), Associate Professor: B.M.E., 1986, M.M., 1992, University of North Texas

MICHELLE VIGNEAU (2004), Associate Professor: B.M., 1985, Oberlin Conservatory of Music; M.M., 1988, New England Conservatory of Music; D.M.A., 2003, University of Texas at Austin

MARY WILSON (2013), Assistant Professor: B.M., 1992, St. Olaf College, M.M., 2000, Washington University, M.M., 1993, New England Conservatory of Music

DARYN ZUBKE (2017), Assistant Professor: B.M., 2010, The Juilliard School; M.M., 2012, Manhattan School of Music; D.M.A., 2017, University of Kansas

## **Theatre and Dance**

JACOB G. ALLEN, M.Mus., Chair

JACOB G. ALLEN (2010), Associate Professor: B.Mus., 2004, B.A. 2004, Lawrence University; M.Mus., 2009, Eastman School of Music

1383

SARAH A. BROWN (2008), Associate Professor: B.A., 1987, Brown University; M.F.A., 1994, Yale School of Drama

HOLLY L. DERR (2018), Assistant Professor: B.A., 1995, The University of North Carolina at Chapel Hill; M.F.A., 2002, Columbia University

JEN GILLETTE (2018), Assistant Professor: B.F.A., 2008, The Ohio State University; M.F.A., 2016, University of North Carolina School of the Arts

STEPHEN W. HANCOCK (1998), Professor: B.A., 1978, University of Louisville; M.F.A., 1984, The Pennsylvania State University

HOLLY C. LAU (1991), Professor, Chair: B.A., 1974, University of Southern Maine; M.F.A., 1991, Ohio State University

ANITA JO LENHART (1987), Professor: B.F.A., 1981, Eastern Kentucky University; M.F.A., 1985, Florida State University

MICHAEL MEDCALF (2018), Assistant Professor: M.F.A., 2013, The University of Iowa

JILL NEE (2014), Associate Professor: B.A., B.S., 2008, Meredith College; M.F.A, 2014 The Ohio State University

MICHAEL S. O'NELE (1998), Associate Professor: B.A., 1995, Coe College; M.F.A., 1998, University of Missouri-Kansas City

ANTHONY PELLECCHIA (2015), Associate Professor: B.A., 2001, Kenyon College; M.F.A., 2009, The Ohio State University

BRIAN RUGGABER (2013), Associate Professor: B.F.A., 1992, Virginia Commonweath University; M.F.A., 1998, University of Massachusetts, Amherst

TRACY THOMAS (2020), Assistant Professor: B.Mus., 1990, Indiana University School of Music; M.Mus., 1993, University of Cincinnati College-Conservatory of Music

JOHN J. YORKE (2002), Instructor: B.A., 1994, Juniata College; M.F.A., 1997, University of Memphis

### **Professional Staff**

ALICE RAINEY BERRY (1999), Director of Publicity and Promotion: B.F.A., 1994, M.F.A., 2012, University of Memphis

DELILAH A. BRYANT (2016), Administrative Assistant II: B.A. Armstrong Atlantic State University; M.P.A., Columbus State University

RICHARD MAYFIELD (2002), Assistant Technical Director: B.S. 1985, Northern Michigan University; M.F.A., 1996, University of Tennessee, Knoxville

KRISTIN SHUPE (2000), Administrative Secretary: B.B.A., 1985, The University of Memphis

CAROLYN WALKER (2019), Costume Shop Supervisor: B.A 2010, SUNY Binghamton; M.A. 2017, Ohio University; M.F.A. 2019, North Carolina School of the Arts

# **College of Education Faculty and Staff**

KANDI HILL CLARKE, Ed.D, Dean ALFRED HALL, Ph.D., Assistant Dean

### **Counseling, Educational Psychology, and Research**

STEVEN L. WEST, Ph.D., Chair (2016), Professor: B.A., 1992, M.S., 1994, Unviersity of Tennessee, Knoxville, Ph.D., 2000, Texas Tech University

MICHELLE BRASFIELD (2015), Assistant Professor: B.A., 1995, Rhodes College; M.S., 2000, Ed.D., 2015, The University of Memphis

PAMELA COGDAL (1988), Clinical Associate Professor: B.S., 1981, M.S., 1983, Ph.D., 1989, Southern Illinois University

ALISON HAPPEL-PARKINS (2012), Associate Professor: B.A., 2003, Luther College; M.A., 2006, California Institute of Integral Studies; PhD, 2011, Georgia State University

1384

LEIGH HARRELL-WILLIAMS (2014), Assistant Professor: B.A., 1997, Virginia Wesleyan College; M.S., 2004, The University of Georgia; Ph.D., 2009, Virginia Tech.

LEIGH FALLS HOLMAN (2015), Assistant Professor: B.A., 1991, Memphis State University; M.A., 1997, Georgia School of Professional Counseling; Ed.S., 2003, The University of Memphis; Ph.D., 2009, Sam Houston State University

YEH HSUEH (2000), Associate Professor: B.A., 1982, Beijing Institute of Aeronautics and Astronautics; Ed.M., 1989, Ed.D., 1997, Harvard University

DANIEL LUSTIG (2003), Associate Professor: B.A., 1975, University of Wisconsin-Madison; M.S.W., 1979, University of Michigan-Ann Arbor; M.A., 1984, Ph.D., 1995, University of Wisconsin-Madison

CHRISTIAN MUELLER, Ph.D. (2006), Professor: B.S.C., 1991, Ohio University, M.A., 1999, University of Colorado Denver, Ph.D., 2006 University of Kentucky

PATRICIA D. MURPHY (2017), Assistant Professor: B.S., 2003, University of Central Arkansas, M.S., 2008, University of Memphis, Ph.D., 2017, Auburn University

SUSAN NAOMI NORDSTROM (2013), Assistant Professor: B.A., 1999, University of Nebraska-Lincoln; M.Ed., 2004, The University of Minnesota-Twin Cities; Ph.D., 2011, The University of Georgia

ERNEST A. RAKOW (1975), Professor, Associate Dean: B.S., 1964, Concordia Teachers College; M.A., 1967, Ph.D., 1974, University of Chicago

ERAINA SCHAUSS (2014) Assistant Professor: B.A., 2002, Boston College; M.S., 2003, The London School of Economics and Political Science; M. Phil., 2004, Cambridge University; Ph.D., 2011, George Washington University

CHRISANN SCHIRO-GEIST, (2004) Professor: B.A., 1967, MEd., 1970, Loyola University; Ph.D., 1974, Northwestern University

KAREN WEDDLE-WEST (1989), Associate Professor, Vice Provost for Graduate Studies: B.S., 1976, M.S., 1977, Ph.D., 1982, University of Tennessee, Knoxville

DEINISE L. WINSOR (2008), Associate Professor: B.A., 1985, Duquesne University; M.S., 1992, Edinboro University; Ph.D., 2008, University of Nevada

YONGHONG JADE XU (2004), Professor: B.S., 1993, Xi'An Jiaotong University; M.S., 1999, The University of Arizona; Ph.D., 2003, The University of Arizona

CHIA-CHEN YANG (2014), Assistant Professor: B.A., 2006, National Taiwan University; M.S., 2010, University of Wisconsin-Madison; Ph.D., 2014, University of Wisconsin-Madison

STEPHEN ZANSKAS (2007), Associate Professor: B.A., 1977, UW-Milwaukee; M.S., 1979, UW-Milwaukee; Ph.D., 2007, Michigan State University

### **Instruction and Curriculum Leadership**

LEE ALLEN (2004), Associate Professor: B.A., 1981, College of Santa Fe; M.S., 1994, University of New Mexico; Ed.D., 2005, Pepperdine University

CELIA K. ROUSSEAU ANDERSON (2002), Associate Professor: B.S., 1991, University of Memphis: Ed.M., 1992, Harvard Graduate School of Education; Ph.D., University of Wisconsin

KEISHANA L. BARNES (2019), Clinical Instructor: Bachelor of Science; 2002, Vanderbilt University; Ed. M., 2003, Harvard Graduate School of Education; Ph.D., expected 2021, University of Memphis

JENNIFER BUBRIG (2010), Clinical Assistant Professor, Site Coordinator: Bachelor of Arts in Education; 1997, University of Mississippi; Master of Education; 1998, University of Mississippi

1385

JEFFREY BYFORD (2007), Associate Professor: B.S., 1994, M.Ed., 1995, Ph.D., 2002, University of Oklahoma

LOGAN CALDWELL (2017), Clinical Instructor: B.A., 2003 University of North Carolina Chapel Hill, M.S., 2011, University of Memphis

LAURA CASEY (2007), Assistant Professor: B.S., 1998, M.A., 2000, University of Alabama; M.S., 2003, Ph.D., 2006, Mississippi State University

TAMMY M. COMBS (2019), Instructor: University of Colorado at Denver: BA, 1998; Metropolitan State College: Teacher Certificiate 2003; University of Phoenix: MAEd, 2004; University of Missouri at Kansas City: Ed.D., 2018

ANNETTE CORNELIUS (2005), Instructor: B.S., 1971, Lipscomb University; MAT, 1984, Ed.D., The University of Memphis

SHELLY COUNSELL (2012), Associate Professor: B.S., 1983, Iowa State University; M.S., 1991, Eastern Illinois University; 2007, Ed.D, University of Northern Iowa

BEVERLY CROSS (2006), Associate Professor, Lillian and Morris Chair of Excellence: B.S., 1979, Alabama A&M University; M.A., 1980, Ph.D., 1992, Ohio State University

LUANN LEY DAVIS (2017), Assistant Professor: B.S., 1991, Colorado State University, M.A., 2005, University fo Northern Colorado, Ph.D., 2016 University of North Carolina Charlotte

WILLIAM HUNTER (2011), Associate Professor of Special Education: Bachelor of Arts in History, 1998, University of Cincinnati; 2006, Master of Arts in Education, Northern Kentucky University; 2011, Ed.D., Special Education, 2011

TORRE CARTER KELLEY (2009), Instructor: B.S., 1989 Lambuth College; MSEd., 1996 Bethel College; Ed.D, 2010 Trevecca Nazarene University

LAURIE MACGILLIVRAY (2006), Associate Professor: B.A., 1986, Rice University; M.A., 1987, Austin College; Ed.D., 1992, University of Houston

JAMES MEINDL (2011), Associate Professor: B.S. Psychology, 2003, Lewis and Clark College; M.A., Applied Behavior Analysis, 2006, Penn State Harrisburg; Ph.D., Applied Behavior Analysis/Special Education, 2011, The Ohio State University

CLIF MIMS (2005), Associate Professor: B.A., 1993, M.Ed., 1994, Harding University; Ph.D., 2004, University of Georgia

DEANNA NOELLE OWENS- MOSBY (2011) B.L.S. University of Iowa Graduated in 2001, MAT University of Phoenix in 2004, Ph.D. in Educational Leadership and Administration from Capella University in 2010

LINDA PAGE (2006), Clinical Assistant Professor: B.S., 1975, Lambuth College; M.Ed., 1981, Memphis State University; D.E.L., 2005, Union University

J HELEN PERKINS (2005), Professor: B.S., 1977, M.Ed., 1983, Southeastern Oklahoma State University; 1999. Oklahoma State University

ANGILINE POWELL (2004), Associate Professor: BS., 1992, University of South Alabama; M.Ed., 1995, University of South Alabama; Ph.D., 1999, University of Alabama

MARY RANSDELL (2002), Clinical Associate Professor: B.S., 1982, University of Southern Indiana; M.A., 1986, Indiana State University-Terre Haute; Ed.D., 2001, University of Kentucky-Lexington

KAY REEVES (2005), Clinical Associate Professor: B.A., 1970, N C Wesleyan College; M.S., 2002, Ed.D., 2003 The University of Memphis

AMANDA J. ROCKINSON- SZAPKIW (2016), Associate, B.S., 1999, Huntington University; M.A., 2004, Regent University; 2009, Ed.D, Regent University; 2018, Ph.D, Liberty University

RACHAEL L. ROSS (2018), Assistant Professor of Elementary Education: B.S., 2011, Lee University; M.Ed., 2014, Louisiana State University; Ph.D., 2017, Clemson University.

WIDELINE SERAPHIN (2019), Assistant Professor of Literacy; PhD, 2019, Curriculum and Instruction; The Pennsylvania State University; MA, 2013, African American and African Diaspora Studies, Indiana University; BA, 2009, English, Rollins College

CRAIG SHEPHERD (2018), Associate Professor: B.S., 2002, Brigham Young University, 2008, The University of Georgia

1386 ANDREW TAWFIK (2017), Assistant Professor: B.S., 2004, Bradley University; M.S., 2008, Indiana University; Ph.D., 2012, University of Missouri

KATHERINE WADE-JAIMES (2017), Assistant Professor:., 2001, BSPH., University of North Carolina-Chapel Hill; 2005, M.S., Georgia Institute of Technology; 2017, Ph.D., Georgia State University

BRIAN WRIGHT (1995) Assistant Professor: B.S., Norfolk State University; M.A., 1996, New York University; 2007, Ph.D., Tufts University

## Leadership

REGINALD L. GREEN, Ed.D. Interim Chair

REGINALD L. GREEN (1996), Professor: B.S., 1962, Tennessee State University; M.E., 1967, Memphis State University; Ed.D., 1975, University of Missouri, Columbia

# School of Communication Sciences and Disorders Faculty and Staff

**Dean and Director** 

Jarmulowicz, Linda D., Ph.D.; Associate Professor, Interim Dean

#### **CSD** Faculty

Audiology Banks, Casandra, Au.D.; Clinical Assistant Professor

Bidelman, Gavin M., Ph.D.; Assistant Professor

Johnson, Jani A., Au.D., Ph.D.; Assistant Professor

Mendel, Lisa Lucks, Ph.D.; Associate Professor, Interim Associate Dean and Director of Graduate Studies

Smith, Eileen, Au.D.; Clinical Assistant Professor

Taylor, Jennifer P., Au.D.; Clinical Associate Professor, Director of Clinical Services, Audiology

Warren, Sarah, Au.D, Ph.D.; Visiting Assistant Professor

#### **Speech-Language Pathology** Buder, Eugene H., Ph.D.; Associate Professor

Eichorn, Naomi, Ph.D; Assistant Professor

Feenaughty, Lynda, Ph.D; Assistant Professor

Haddix, Vicki, M.S., Clinical Assistant Professor

Jarmulowicz, Linda D., Ph.D.; Associate Professor, Interim Dean

Marshall, Julie, M.A.; Clinical Associate Professor

Merrill, JoClaire, M.A., Clinical Assistant Professor

Oller, D. Kimbrough, Ph.D.; Professor and Plough Chair of Excellence

Sandidge, John L., M.A.; Clinical Associate Professor

van Mersbergen, Miriam, Ph.D., Assistant Professor

#### Instructors

Fairbanks, Sharon P., M.A.

#### Emeritus

Cox, Robyn M., Ph.D.; Professor Emeritus

Gould, Herbert Jay, Ph.D.; Associate Professor Emeritus

Kahane, Joel C., Ph.D.; Professor Emeritus

Manning, Walter H., Ph.D.; Professor Emeritus

Mendel, Maurice I., Ph.D.; Professor Emeritus

Studebaker, Gerald A., Ph.D.; Distinguished Professor Emeritus

Wark, David J., Ph.D.; Associate Professor Emeritus

Part-Time Clinical Supervisors Cornell, Anna, M.A., CCC-SLP

Cornelius, Annie, BCBA

Taran, Valentina, Ph.D., CCC-SLP

Winters, Darlene, M.A., CCC-SLP

**CSD Staff Administrative Support** Breland, Frances; Administrative Associate II, 901.678.5877

Edwards, Joseph; Business Officer II, 901.678.2460

#### **Business Office Support** Dede, Vonda; Office Associate, 901.678.5858

Inniss, Shamira; Office Associate, 901.678.2009

#### **Research Support**

Bene, Edina, Project Coordinator II, 901.678.2573

Brainerd, Ed; Manager, Computer Systems Support - CRISCI, 901.678.5860

Fulmer, Kathleen: Research Associate I, 901.678.2591

Loeding, Erin, Assistant Coordinator, 901.678.2573

Payne, Alexis, Research Associate II; 901/678.5831

Pousson, Monique; Research Associate I, 901.678.5832

Rangisetty, Neeraja, Research Associate II, 901.678.2573

Taylor, Pamela; Financial Services Associate, 901.678.5829

#### **ITS Support**

Saadat, Hassan; Local Technical Support Provider II, 901.678.5862

Yanik, Devan; Audio Visual Multimedia Specialist I, 901.678.3157

# **College of Health Sciences Faculty and Staff**

The online catalog can be accessed at: http://catalog.memphis.edu/index.php

## **Professional Staff**

COURTNEY BASS, Administrative Associate II MATT BUTAWAN, Research Associate II HILARY DELUCO, Business Officer II ANGELA JOHNSON, M.S., Academic Services Coordinator DAVID KEAN, Ph.D., Internship Coordinator JESSICA NEWSOME, M.A., Coordinator of Recruitment & Pre-Enrollment Activities MARY TATE-EVANS, Senior Administrative Secretary KATHY WALKER, M.S., Assistant Director of Student Services LAWRENCE WEISS, Ed.D., Director of Academic Programs

# **Dietetics/Nutrition**

SARA FOLEY (2016), Clinical Assistant Professor: B.S., 2004, Mississippi State University; M.S., 2006, Mississippi State University

KEITH MARTIN (2017), Research Assistant Professor: B.A., 1987, University of North Carolina at Greensboro; M.Tox., 2001, North Carolina State University; Ph.D., 1997, University of North Carolina at Greensboro

BRANDT PENCE (2016), Assistant Professor: B.A., 2007, Purdue University; Ph.D., 2012, University of Illinois Urbana-Champaign

ROBIN ROACH (1984), Associate Professor: B.S., 1976, Memphis State University; R.D. Dietetic Internship, 1977, University of Arkansas Medical Center; M.P.H., 1980, Tulane University School of Public Health; Ed.D., 1989, Vanderbilt University

MARY CATHERINE SCHALLERT (2013), Clinical Assistant Professor: B.S., 2005, Harding University; M.S., 2006, The University of Memphis

TERRA SMITH (1997), Associate Professor: B.S., 1985, Cornell University; M.S., 1997, Oklahoma State University; Ph.D., 1997, Oklahoma State University

MARIE VAN DER MERWE (2014), Assistant Professor: B.Sc.Hons, 1998, University of Potchefstroom; Ph.D., 2007, University of Tennessee, Memphis

ANGELA WALLICK (2018), Instructor: B.S., 2006, The University of Memphis; M.S., 2008, Kent State University

YUFENG ZHANG (2018), Assistant Professor: B.S., 2009, University of Electronic Science and Technology of China; Ph.D., 2015, University of South Dakota

### **Exercise, Sport and Movement Sciences**

LUCAS BAUMGARTNER (2018), Instructor: B.S., 2007, Saginaw Valley State University; M.S., 2011, University of Tennessee

RICHARD BLOOMER (2004), Professor, Dean: B.S., 1996, Buffalo State College; M.S., 1998, Ithaca College; Ph.D., 2003, University of North Carolina at Greensboro

MATT BUTAWAN (2015), Research Associate II: B.S., 2013, The University of Memphis

DANIEL GREENWOOD (2018), Research Assistant Professor: B.A., 2002 University of Technology, Sydney; B.A., 2003, University of Technology, Sydney; B.A. (Hons), 2004, University of Technology, Sydney; Ph.D., 2014, Queensland University of Technology

YUHUA LI (1994), Professor: B.S., 1978, Shanghai Institute of Physical Education; M.S., 1981, Shanghai Normal University; M.S., 1990, The Pennsylvania State University; Ph.D., 1994, Texas A&M University

DAVID KEAN (2018), Instructor, Internship Coordinator: B.Ed., 1989, University of Toledo; M.Ed., 1996, University of Toledo; Ph.D., 2012, Kent State University

1389

MAX PAQUETTE (2012), Associate Professor: B.Sc.Hons, 2007, University of Guelph; M.Sc., 2009, University of Guelph; Ph.D., 2012, University of Tennessee

DOUGLAS POWELL (2016), Assistant Professor: B.S., East Carolina University; M.A., East Carolina University; Ph.D., University of Tennessee Knoxville

MELISSA PUPPA (2016), Assistant Professor: B.S., 2008, Roanoke College; Ph.D., 2014, University of South Carolina

LAWRENCE WEISS (1986), Professor, Director of Academic Programs: B.S., 1974, Old Dominion University; M.Ed., 1975, The University of Georgia; 1979, Ed.D., The University of Georgia

### **Health Sciences and Health Promotion**

MANDY AYCOCK (2019), Instructor: B.S.Ed., 2011, The University of Memphis; M.S., 2013, The University of Memphis

TARA HUNTER (2018), Instructor: B.S.Ed, 2013, The University of Memphis; M.S., 2014, The University of Memphis; B.S.N., 2016, University of Tennessee Health Science Center

CHERI KILMURRAY (2018), Instructor: B.S., 1999, Rutgers University; M.P.H., 2000, Boston University

ANNA LANGSTON (2018), Instructor: B.A., 2004, Mississippie State University; M.S., 2010, The University of Memphis

BARBARA MCCLANAHAN (1986), Associate Professor: B.S., 1981, The University of Memphis; M.S., 1983, The University of Memphis; Ed.D., 1990, The University of Memphis; Ph.D., 1997, University of Mississippi

ANNA MOORE (2015), Instructor: B.S.Ed., 2008, The University of Memphis; M.S., 2011, The University of Memphis

JEBOSE OKWUMABUA (1986), Professor: B.S., 1976, Memphis State University; M.S., 1980, Memphis State University; Ph.D., 1985, The University of New Mexico

FEDORIA RUGLESS (2018), Research Assistant Professor: B.S., 2007, Oakwood University; Ph.D., 2012, University of Cincinnati College of Medicine

MICHELLE STOCKTON (1999), Associate Professor: B.S., 1992, Louisiana State University; M.S., 1995, Mississippi State University; Ph.D., 2005, The University of Memphis

### **Healthcare Leadership**

SHIRLEY BROWN (2013), Clinical Assistant Professor: B.S.N., 1996, Union University; M.S.N., 2003, Union University; Ed.D., 2013, Union University

SHEMEKA HAMLIN-PALMER (2018), Clinical Assistant Professor: B.S., 2002, Jackson State University; M.P.H., 2004, Jackson State University; Ph.D., 2012, University of Mississippi Medical Center

WILLIAM P. TRAVIS (2013), Clinical Associate Professor: B.S., 1966, Spring Hill College; M.S., 1969, University of Alabama; Ph.D., 1976, University of Alabama

# **Physical Education Teacher Education**

BECKY BOCZ (2017), Instructor: B.S., 2008, The University of Memphis; M.S., 2013, The University of Memphis

NIKI BRAY (2015), Instructor: B.S., 1997, The University of Memphis; M.S., 2008, The University of Memphis; Ed.D., The University of Memphis, 2017

DIANE COLEMAN (1981), Instructor: B.S., 1979, Memphis State University; M.Ed., 1981, Memphis State University

CAROL IRWIN (2007), Associate Professor: B.A., 1979, University of Northern Colorado; M.A., 1991, Kent State University; Ph.D., 2003, Kent State University

TODD LAYNE (2012), Associate Professor: B.S., 1999, Tennessee Technological University; M.A., 2001, Tennessee Technological University; Ph.D., 2012, Auburn University

DEBRA WYATT (2014), Instructor, Coordinator: B.L.S., 2010, The University of Memphis; M.S., 2012, The University of Memphis

## **School of Public Health**

JAMES G. GURNEY, Ph.D, Dean

# Herff College of Engineering Faculty and Staff

RICHARD SWEIGARD, Ph.D., Dean RUSSELL DEATON, Ph.D., Associate Dean for Academic Affairs STEPHANIE IVEY, Ph.D., Associate Dean, Research ROGER MEIER, Ph.D., Director, Graduate Studies

BETSY LOE, M.A., Undergraduate Advisor

### **Biomedical Engineering**

EUGENE ECKSTEIN, Ph.D., Chair

GARY L. BOWLIN (2013), H. Herff Chair of Excellence and Professor: B.E., 1988, Youngstown State University; M.S., 1990, University of New Hampshire; Ph.D., 1996, University of Akron

JOEL BUMGARDNER (2004), Professor: B.S., 1984, M.S.B.M.E., 1989, Ph.D., 1994, University of Alabama at Birmingham

AMY de JONGH-CURRY (2000), Associate Professor: B.S.E.E., 1992, M.S., 1993, Ph.D., 1997, University of Memphis

DENNIS DiANGLEO\* (1995), Associate Professor: B.S., 1983, University of Waterloo; M.S., 1986, Ph.D., 1993, University of McMaster

EUGENE C. ECKSTEIN (2000), Professor, Chair: S.B.M.E., 1970, S.M.M.E., 1970, Ph.D., 1975, Massachusetts Institute of Technology

WARREN O. HAGGARD (2004), H. Herff Chair of Excellence and Professor: B.S., 1978, Auburn University; M.S.E., 1981, Ph.D., 1994, University of Alabama at Birmingham

JESSICA AMBER JENNINGS (2007) Assistant Professor: B.S., 1999, University of Alabama; M.S., 2003, Ph.D., 2007, University of Alabama at Birmingham

ERNO LINDNER (1999), Professor: M.S., 1971, Ph.D., 1985, Technical University of Budapest; D.Sc., 1985, Hungarian Academy of Science

WILLIAM M. MIHALKO\* (2012), J.R. Hyde Professor: M.D., Virginia Medical School; Ph.D., Medical College of Virginia

BRADFORD D. PENDLEY (2012), Affiliate Professor: Ph.D., 1992, Cornell University; M.D., 2007, University of Tennessee Health Science Center

BROOKE SANFORD\* (2015), Assistant Professor: B.E., 2006, Vanderbilt University; M.S., 2008, Ph.D., 2013, University of Memphis

1391

RICHARD SMITH\* (1998), Associate Professor: BS, 1979, MS, 1983, PhD, 1997, University of Memphis

JOHN LEICESTER WILLIAMS (2008), Professor: B.S., 1975, University of Hawaii; M.S., 1979, Ph.D., 1981, Northwestern University

\*University of Tennessee faculty in the joint U of M-UT Biomedical Engineering graduate program

### **Civil Engineering**

SHAHRAM PEZESHK, Ph.D., Chair

ADEL ABDELNABY (2012), Associate Professor: B.S., 2005, Cairo University; Ph.D., 2012, University of Illinois

DAVID ARELLANO (2005), Associate Professor: B.S.C.E., 1986; M.S.C.E., 1998; Ph.D., 2005, University of Illinois

CHARLES V. CAMP (1989), Professor: B S.C.E., 1981, M.S., 1986, Auburn University; Ph.D., 1987, Oklahoma State University

MIHALIS GOLIAS (2009), Professor: B.S.C.E, 2001, Aristotle University; M.S.C.E., 2004, Ph.D., 2007, Rutgers University

STEPHANIE S. IVEY (2005), Professor, Associate Dean, Research : B.S.C.E., 1996; M.S.C.E., 1998; Ph.D., 2003, University of Memphis

MARTIN E. LIPINSKI (1975), Emeritus Professor: B.S.C.E., 1964, University of Illinois; Certificate in Traffic Engr., 1965, Yale; M.S.C.E., 1966, Ph.D., 1972, University of Illinois

CLAUDIO I. MEIER (2015), Associate Professor: B.S.C.E., 1988, Professional Diploma Civil Engrg., 1990, University of Concepción, Chile; M.S.C.E., 1995, Colorado State University; Ph.D., 2008, The University of Montana

ROGER W. MEIER (1995) Associate Professor, Coordinator of Graduate Studies: B.S.C.E., 1979, Virginia Tech; M.S.C.E., University of Colorado; Ph.D., 1995, Georgia Institute of Technology

SABYASACHEE MISHRA (2013), Associate Professor: B.S.C.E., 2002, Utkal University; M.S.C.E., 2005, Indian Institute of Technology Bombay; Ph.D., 2009, Wayne State University

LARRY W. MOORE (1983), Emeritus Professor: B.S.C.E., 1973, University of South Alabama; M.S.C.E., 1974, Ph.D., 1983, Mississippi State University

PAUL J. PALAZOLO (2002), Associate Professor: B.S.C.E., 1974, M.S.C.E., 1976, Memphis State University; Ph.D., 1998, The Georgia Institute of Technology

SHAHRAM PEZESHK (1989), Professor, Chair: B.S.C.E., 1982, University of Illinois; M.S.C.E., 1983, University of California at Berkeley; Ph.D., 1989, University of Illinois

MARYAM SALEHI (2017), Assistant Professor: B.Sc., 2008, Yazd University, Iran; M.Sc., 2014, University of South Alabama; Ph.D., 2017, Purdue University

WILLIAM T. SEGUI (1968), Emeritus Professor: B.S.C.E., 1960, M.S., 1966, Ph.D., 1971, University of South Carolina

BRIAN A. WALDRON (1999), Associate Professor: B.S.C.E., 1992, Memphis State University; M.S.C.E., 1994, University of Memphis; Ph.D., 1999, Colorado State University

### **Electrical and Computer Engineering**

CHRYSANTHE PREZA, D.Sc., Chair

MOHD HASAN ALI (2011), Associate Professor: B.S., 1995, Rajshahi University of Engineering and Technology; M.S., 2001, Ph.D., 2004, Kitami Institute of Technology

MADHUSUDHANAN BALASUBRAMANIAN (2013), Associate Professor: B.E., 1998, PSG College of Technology, India; M.S., 2003, Ph.D., 2006, Louisiana State University

BONNY BANERJEE (2011), Associate Professor: B.E., 2000, Jadavpur University, India; M.S., 2002, Ph,D., 2007, Ohio State University

1392

RUSSELL DEATON (2012), Professor, Associate Dean: B.A., 1981, University of North Carolina; B.S.E.E., 1984, University of Memphis; M.S.E.E., 1988, Duke University; Ph.D., 1992, Duke University

STEVEN T. GRIFFIN (1982), Associate Professor: B.S.E.E., 1975, Memphis State University; M.S., 1977, Ph.D., 1979, University of Illinois

XIANGEN HU (1993) Professor, Joint with Department of Psychology: B.S., 1982, M.S., 1985, Huazhong University; M.A., 1991, Ph.D., 1993, University of California, Irvine

EDDIE JACOBS (2006), Professor, Undergraduate Coordinator: B.Sc., 1986, M.S.E.E., 1988, University of Arkansas; Ph.D., 2001, George Washington University

ANA DOBLAS (2016) Assistant Professor: B.S., 2010; M.S. 2011, Ph.D., 2015, University of Valencia, Spain

PETER LAU (2003), Associate Professor: B.A.Sc., 1993, M.A.Sc., 1986, Ph.D., 1990, University of Toronto

BASHIR MORSHED (2011), Associate Professor, Lab Coordinator: B.S., 1998, Bangladesh University of Engineering and Technology; M.S., 2004, The University of Windsor, Canada; Ph.D., 2010, Carleton University, Canada

CHRYSANTHE PREZA (2006), Professor, Chair: B.S.E.E., 1987, B.S.C.S., 1987, M.S.E.E., 1990, M.S.C.S., 1991, D.Sc., 1998, Washington University in St. Louis

AARON L. ROBINSON (2002), Associate Professor, Graduate Coordinator: B.S.E.E., 1994, M.S.E.E., 1997, Ph.D., 2001, Florida State University

MOHAMMED YEASIN (2005), Professor: B.Sc., 1989, Bangladesh Institute of Technology; M.Sc., 1994 Bangladesh University of Engineering and Technology; Ph.D., 1998, Indian Institute of Technology

# **Engineering Technology**

SCOTT SOUTHALL, M.S.E.T., Chair

THOMAS BANNING (2005), Associate Professor: B.S.I.T., 1982, Southern Illinois University-Carbondale; M.S., 1985 Memphis State University

KEVIN BERISSO (2013), Assistant Professor: B.S., 1994, Ohio University ; M.S., 1996, Indiana State University Ph.D., 2003, Indiana State University.

LENWOOD FIELDS (2016), Assistant Professor: B.S.E.E., 1988, Christian Brothers University, M.S. Electrical and Computer Engineering, University of Florida, Ph.D., 2006, Florida Agricultural and Mechanical University

ROBERT HEWITT (2003), Associate Professor: B.S.E.T., 1996, M.S.E.T., 2003, University of Memphis; M.Div., 2003, Mid-America Baptist Theological Seminary

DEBORAH J. HOCHSTEIN (1991), Associate Professor, Associate Dean for Academics and Administration: B.S., 1976, Georgian Court College; M.S., 1984, University of Akron

DANIEL E. KOHN (2008), Associate Professor: B.S.E.T., 2000, M.S.E.T., 2001, University of Southern Mississippi

JAMES MCGINNIS (2016), Assistant Professor: B.S., 2003, M.S., 2005 Arkansas State University, Ph.D., 2016, University of Arkansas at Little Rock

SCOTT C. SOUTHALL (1994), Associate Professor, Chair: B.S.E.T., 1987, M.S., 1991, Memphis State University

CARL RAY WILLIAMS (1998), Associate Professor: B.S., 1976 Mississippi State University; B.S.I.E., 1976, Mississippi State University; M.B.A., 1983, Memphis State University; M.S., 2004, University of Memphis

## **Mechanical Engineering**

#### ALI FATEMI, Ph.D., Chair

EBRAHIM ASADI (2015). Assistant Professor: B.Sc., 2006, University of Kerman; M. Sc., 2008, Amirkabir University of Technology; Ph.D., 2011, Mississippi State University

ALI FATEMI (2017), Professor, Chair: B.S., 1979, University of Iowa; M.S., 1980, University of Iowa; PhD., 1985, University of Iowa

SRIKANT GIR (1987), Assistant Professor: B.S.Ch.E., 1976, Osmania University, India; M.S.Ch.E., 1977, Oklahoma State University; Ph.D., 1992, University of Strathclyde, Scotland

RANGANATHAN GOPALAKRISHNAN (2016), Assistant Professor: B. Tech. M.E., 2008, National Institute of Technology, Tiruchirappalli, India; Ph.D., 2013, University of Minnesota

JOHN I. HOCHSTEIN (1991), Professor, Chair: B.S., 1973, Stevens Institute of Technology; M.S.M.E., 1979, Pennsylvania State University; Ph.D., 1984, University of Akron

WILLIAM S. JANNA (1987), Professor: B.S.M.E., 1971, M.S.M.E., 1973, Ph.D., 1976, University of Toledo

GLADIUS LEWIS (1987), Professor: B.Sc., 1972, University of London, England; M.Sc., 1974, Council for National Academic Awards, England; Ph.D., 1976, University of Nottingham, England

HSIANG H. LIN (1985), Professor: B.S.M.E., 1974, National Chung-Hsing University; M.S.M.E., 1980, Ph.D., 1985, University of Cincinnati

JEFFREY G. MARCHETTA (2002), Professor: B.S.M.E., 1997, M.S.M.E., 1999, Ph.D., 2002, University of Memphis

JOHN I. HOCHSTEIN (1991), Professor: B.S., 1973, Stevens Institute of Technology; M.S.M.E., 1979, Pennsylvania State University; Ph.D., 1984, University of Akron

GANG QI (1998), Professor: B.S., 1982, Inner Mongolia Polytech University; M.S.A.E., 1987, China Agricultural University; Ph.D., 1996, Texas Tech University

TEONG ENG TAN (1984), Associate Professor: B.Sc.E., 1980, M.Sc.E., 1981, University of New Brunswick, Canada; Ph.D., 1984, Iowa State University

# Loewenberg College of Nursing Faculty and Staff

LIN ZHAN, Ph.D., RN, FAAN, Dean & Professor

TBF - Associate Dean for Academic Programs

ERIC BAILEY, II, Ed.D., M.B.A, Assistant Dean for Nursing Students

CHRISTIE MANASCO, Ph.D., RN, Assistant Dean (Lambuth Campus)

LISA BEASLEY, D.N.P., RN, Director for Clinical Education

Nursing Staff:

Joe Brandenburg, Director of Development

Toni Marie Briley, Academic Services Coordinator I, Undergraduate Program

Jeri Burton, Office Assistant

Ashleigh Carroll, Clinical Placement Coordinator, MSN Program

Chermale Casem, Director for Strategic Partnerships

Charles Daniels, Academic Advisor II, BSN Program

Alfreda Davis, Administrative Associate II, Assistant to the Dean

RayShauna Davis, Business Officer II

Melissa Eakens, Administrative Associate I

Tiffany Elliott, Nursing Laboratory Coordinator (Lambuth Campus) Brenda Fortney, Clinical Placement Coordinator, BSN Program Kendra Johnson, Administrative Assistant Cynthia Lindsey, Administrative Assistant I, (Lambuth Campus) Shani Maples, Nursing Laboratory Manager Corey Moore, College Academic Advisor II (Lambuth Campus) Norma Neal, RN to BSN Program Coordinator Kimberly Rogers, Web Specialist II Leila Schroeder, Academic Services Coordinator II, Graduate Program Everlena Smith, Administrative Associate II, Assistant to the Associate Dean Dale Williams, Academic Advisor II, MSN Program

#### Nursing Faculty:

REBECCA ADKINS (2010), Clinical Associate Professor: B.S.Ed., 1987, Memphis State University; A.D.N., 1994, Shelby State Community College; B.S.N., 1996, The University of Memphis; M.S.N., 1997, University of Tennessee Health Science Center.

CULETA ARMSTRONG (2010), Clinical Assistant Professor: B.S.N., 2004, Millikin University; M.S.N., 2009, University of Phoenix; D.N.P., 2018, University of Tennessee-Chattanooga.

MICHELLE BALDWIN\* (2015), Clinical Assistant Professor: B.S.B.A, 1997, Union University; B.S.N., 2005, Union University; D.N.P, 2015, University of Tennessee Health Science Center.

TONI BARGAGLIOTTI (1992), Professor: B.S.N., 1976, University of Tennessee Health Science Center; M.S.N., 1978, University of California at San Francisco; Ph.D., 1984, University of California at San Francisco.

LISA BEASLEY (2010), Clinical Associate Professor: B.S.N., 2005, The University of Memphis; M.S.N., 2010, The University of Memphis; D.N.P. 2015, University of Alabama.

LINDA BILLINGS (2019), Clinical Associate Professor: B.S.N, 2009, Union University; M.S.N, 2010, Union University; D.N.P, 2015, Union University; Post-Graduate Family Nurse Practitioner (FNP), 2017, University of Massachusetts.

ANITA BOYKINS (2018), Associate Professor: B.S.N., 1982, Lewis University; M.S.N., 1987, UT-Memphis, DNSc, 2003, University of Tennessee Health Science Center.

JACQUELINE BOWEN BUFORD (2013), Clinical Assistant Professor: B.S.N., 1992, Memphis State University; M.S.N., 2011, Walden University.

REBECCA BURROW\* (2019), Clinical Assistant Professor: B.S.N., 1995, Union University; M.S.N, 2017, Union University.

DIANE BUTLER\* (2011), Clinical Professor: B.S.N., 1985, Memphis State University; M.S.N., 1987, University of Tennessee Health Science Center; Postmaster's Family Nurse Practitioner (FNP) Certificate, Belmont University; D.N.P., 2010, Oakland University.

SAMANTHA CALHOUN (2017), Clinical Assistant Professor: B.S.N., 2013, The University of Memphis; M.S.N., 2017, The University of Memphis.

GLORIA CARR (2002), Associate Professor: B.S.N., 1992, Union University; M.S.N., 1997, University of Tennessee Health Science Center; Ph.D., 2007, University of Texas, Arlington.

HOI SING CHUNG (2014), Clinical Associate Professor: MB, 1988, Nantong Medical College; MPhil, 1998, Chinese University of Hong Kong; Ph.D., 2001, Chinese University of Hong Kong; B.S.N., 2008, University of Tennessee Health Science Center.

1395

JULIE CUPPLES\* (2014), Clinical Assistant Professor: B.S.N., 2005, Murray State; M.S.N., 2013, The University of Memphis.

JILL DAPREMONT (2006), Associate Professor: B.S.N., 1983, Dillard University; M.S.N., 1987, Louisiana State University; Ed.D., 2008, Argosy University.

MARY ELLIOTTE (2007): Clinical Associate Professor: B.S.N., 2003, The University of Memphis; M.S.N., 2005, The University of Memphis; D.N.P., 2014, University of Alabama.

BELINDA FLEMING (2009), Clinical Associate Professor: B.S.N., 1976, Southern Adventist University; M.S.N., 1985, University of Tennessee Health Science Center; Ph.D., 2009, University of Tennessee Health Science Center.

YOLANDA FLEMMONS, (2018), Clinical Assistant Professor: BA, 2003, LeMoyne-Owen College; B.S.N., 2006, The University of Memphis; M.S.N., 2012, The University of Memphis.

MARIE GILL (2014), Assistant Professor: B.S.N., 1988, University of Tennessee Health Science Center; MS, 1995, The University of Memphis; M.S.N. 2006, The University of Memphis; Ph.D., 2012, University of Tennessee Health Science Center.

BRADLEY HARRELL (2015), Clinical Associate Professor: B.S.N, 2003, The University of Memphis; M.S.N., 2006, The University of Memphis; D.N.P, 2009, University of Tennessee Health Science Center.

JOY HOFFMAN (2005) Clinical Professor: B.A. in Nursing, 1996, St. Olaf College; M.S.N., 2001, University of Wisconsin - Madison; D.N.P., 2012, University of Tennessee Health Science Center

SHERI HOWARD (2011), Assistant Professor: B.S.N., 2008, University of Phoenix; M.S.N., 2010, University of Phoenix; Ph.D., 2017, William Carey University.

MIKA JACKSON (2019), Clinical Assistant Professor: AAS, 2006 Southwest Tennessee Community College; B.S.N., 2010, Baptist College of Health Sciences; M.S.N., 2015, The University of Memphis.

MELANIE JACOBS (2013), Clinical Assistant Professor: B.S.N., 1982, Arkansas Tech University; M.S.N., The University of Memphis.

NATHAN KNAPPIER (2019), Clinical Associate Professor: BA, 2001, Harding University; B.S.N., 2006, Union University; M.Div., 2008, Harding School of Theology; M.S.N., 2011, Union University.

STACEY D. LABARRE-POWELL (2016), Clinical Assistant Professor: B.S.N., 1990, Memphis State University; M.S.H.C.A., 1992, College of St. Francis; M.S.N., 1996, University of Tennessee Health Science Center; D.N.P., 2016, Union University.

SOHYE LEE (2017), Assistant Professor: B.S.N., 2007, Ajou University, South Korea; Ph.D., 2017, University of Minnesota.

KAYE LITANO (2012), Clinical Assistant Professor: B.S.N., 1992, Union University; M.S.N., 2011, Union University.

CHRISTIE MANASCO\* (2012), Clinical Professor: B.S.N., 1993, University of South Alabama; M.S.N., 2003, Union University; Ph.D., 2017, William Carey University.

ANNAPOORNA MARY (2012), Assistant Professor: B.S.N., 1999, Madras Medical College; M.S.N., 2002, Sri Ramachandra Medical College and Research Institute; Ph.D., 2007, University of Tennessee Health Science Center.

MARY MCDOUGAL (2011), Clinical Assistant Professor: B.S.N., 1977, University of Arkansas; M.S.N., 1998, Arkansas State University.

CANDACE MCGOWEN (2016), Clinical Assistant Professor: B.S.N., 2000, University of Colorado; M.S.N., 2009, The University of Memphis.

ROSEMARY MCLAUGHLIN\* (2016), Clinical Professor: B.S.N., 1982, Harding University; M.S.N., 1988, University of Arkansas Medical Sciences; Ph.D. 2009, University of Tennessee Health Science Center.

ELIZABETH MOORE (2014), Clinical Assistant Professor: B.A., 2001, Hendrix College; B.S.N., 2004, University of Arkansas; M.S.N., 2011, Walden University.

RENEE MORRIS\* (2013), Clinical Associate Professor: B.S.N., 1989, University of Tennessee-Knoxville; M.S.N., 2012, The University of Memphis.

ANGELA S. OIGBOKIE (2014). Clinical Assistant Professor: BSN, 2001, Union University-Germantown; MSN & MBA-HCM., 2010, University of Phoenix, D.N.P, 2018.

1396

DEMETRIC OSBORN\* (2020). Clinical Assistant Professor: A.A.S.-Nursing, Bevill State Community College; B.S.N., 2012, Mississippi University for Women; M.S.N., 2015, University of Mississippi Medical Center; D.N.P., 2019, Samford University.

PAULETTE PALMER (2006), Clinical Assistant Professor: B.S.N., 1982, Memphis State University; M.P.A., 1987, M.S.N., 2005, The University of Memphis.

CATHY PANTIK (2018), Assistant Professor: BS, 1987, Southern Methodist University; B.S.N., 2011, Union University, Ph.D., 2019, University of Tennessee Health Science Center, D.N.P., 2018, University of Tennessee Health Science Center.

SHKENDIE PAPRANIKU (2012), Clinical Associate Professor: B.S.N., 2006, Wagner College; M.S.N., 2012, The University of Memphis; Postmaster's FNP certificate, 2016, The University of Memphis.

FELESHA PERRY (2011), Clinical Associate Professor: B.S.N., 2005, The University of Memphis; M.S.N., 2010, Arkansas State University; Postmaster's NE certificate, 2010, Arkansas State University; Postmaster's FNP certificate, 2013, The University of Memphis; D.N.P., 2016, University of Alabama.

TRACEY POWER (2016), Clinical Assistant Professor: B.S.N., 2008, The University of Memphis; M.S.N., 2011, The University of Memphis; D.N.P., 2019, Union University.

JOY PRICE\* (2018), Clinical Associate Professor: Associate in Nursing, 1981, Northeast Mississippi Community College; B.S.N., 1983, University of Alabama-Huntsville; M.S.N., 1990, Mississippi University for Women; D.N.P., 2016, University of Tennessee Health Science Center.

TERESA RICHARDSON (2008), Clinical Professor: B.A., 1978, University of South Florida; M.S.N., 2004, Vanderbilt University; D.N.P., 2010, Vanderbilt University.

JASON SASSER (2014), Clinical Associate Professor: AAS, 2006, Southwest Tennessee Community College; B.S.N., 2008, The University of Memphis; M.S.N., 2011, The University of Memphis; D.N.P., 2017, University of Tennessee-Chattanooga.

NAKIESHA SHEPHERD (2012), Clinical Assistant Professor: B.S.N., 2003, Samford University; M.S.N., 2010, Samford University; D.N.P., 2018, University of Tennessee Health Science Center.

MELISSA SHOAFF (2008), Clinical Assistant Professor: B.S.N., 2002, The University of Memphis; M.S.N., 2007, The University of Memphis.

KAY SIMS (2009), Clinical Associate Professor: B.S.N., 1991, Union University; M.S.N., 1993, University of Tennessee Health Science Center.

GENAE STRONG (2007), Assistant Professor: B.S.N., 1991, University of South Alabama; M.S.N., 1998, University of Kentucky; Ph.D., 2005, University of Tennessee Health Science Center.

TERRI TROTTER (2005), Clinical Assistant Professor: B.S.N., 2002, The University of Memphis; M.S.N., 2005, The University of Memphis.

PAULA WALKER (2018), Clinical Assistant Professor: BS, 2002, Christian Brothers University; B.S.N., 2009, Union University; M.S.N., 2011, Union University; D.N.P., 2018, Union University.

BEVERLY WEST (2006), Assistant Professor: B.S.N., 1985, Memphis State University; M.S.N., 2006, The University of Memphis; Ph.D., 2017, Capella University.

Y'ESHA WILLIAMS (2016), Clinical Associate Professor: B.A., 2008, The University of Mississippi; M.S.N., 2012, University of Tennessee Health Science Center; Ph.D., 2016, University of Tennessee Health Science Center.

JANYE WILSON (2015), Clinical Assistant Professor: B.S.N., 2002, The University of Memphis; M.S.N., 2010, Vanderbilt University.

GLENDA WOTHERS (2015), Clinical Assistant Professor: B.S.N., 2002, University of Tennessee-Martin; M.S.N., 2013, The University of Memphis.

LIN ZHAN (2010), Professor: BS, 1980, West China Medical University; MSN, 1987, Boston University; Ph.D., 1993, Boston College.

\*Lambuth Campus

# **College of Professional & Liberal Studies Faculty and Staff**

#### RICHARD IRWIN, Ed.D., Executive Dean

#### JOANNE GIKAS, Ed.D., Associate Dean

#### DOROTHY HALE, Ed.D., Assistant Director, Student Services

Advising Staff MARY EWART, Online Academic Services Coordinator, Academic Advisor

ERNEST HENDLEY, Baccalaureate Contract Advisor DANESHA WINFREY, Academic Advisor DEBBIE WYATT, Academic Advisor JACQUELYN D. COLE, Graduation Analyst

Office Staff ELIZABETH BUCK, Office Associate PATRICIA HARRIS, Senior Administrative Secretary LAURA ROBBINS, Office Associate

#### Faculty

JOY HUNTER AUSTIN (2012), Instructor: M.Ed., 1976, University of Memphis; M.A., 1978, D.A. 1983, University of Mississippi

COLIN CHAPELL (2011), Instructor/DLS Advisor, 2004, B.A. Covenant College, 2006, M.Phil, University of Cambridge, Ph.D., 2011, University of Alabama

HANS H. CHUN (2010), Instructor: B.A., M.A., 2005, Ed.D., 2008, University of the Pacific

GEORGIA CRESON, 2019, Clinical Assistant Professor, M.F.A., 2011, Memphis College of Art

HAL FREEMAN (2012), Lecturer: M.B.A., 1999, Union University

CURTIS HART (2014), Instructor: B.S., 1971, M.S., 1972, Murray State University

SANDRA GUNTHARP (2005), Clinical Assistant Professor, M.S., 1992, University of Memphis

TIFFANY JOHNSON (2014), Instructor/Coordinator: B.A. 1999, University of Miami; J.D., 2002, Georgetown University

RADIE KRUEGER (2014), Instructor: M.S., 2004, Ed.D., 2008, Nova Southeastern University

DAN LATTIMORE (1987), Professor: B.A., 1966, M.A., 1968 Texas Christian University; M.A., 1968, Southwestern Baptist Theological Seminary; Ph.D., 1972, University of Wisconsin-Madison

RAMONA SONIN LEE (2016) Clinical Associate Professor, B.A., 1993, M.F.A, 1998, University of Memphis

LORRAINE MEINERS-LOVEL (2012), Instructor/Coordinator: B.A., Southeastern Louisiana University; M.A., 2011, University of Memphis

LORETTA RUDD (2013), Clinical Associate Professor: M.Ed., 1997, Tarleton State University; M.A., 1987, University of Texas; Ph.D., 2003, Baylor University

RON SERINO (2017) Instructor: B.A., 1993, Emory University; M.Div., 1996, Union Theological Seminary; Ph.D., 2016, Brite Divinity School, Texas Christian University

# Kemmons Wilson School of Hospitality and Resort Management Faculty

RADESH PALAKURTHI, Ph.D., Director

EUN-KYONG CHOI (2013), Assistant Professor: B.B.A., 2005, Paichai University, South Korea; M.S., 2008, Florida International University; Ph.D., 2013, Texas Tech University PADESH PAL AKUPTHI (2012). Interpentingental Hotels Group Chair of Excellence Professor. Director: P.S., 1088, Florida International

RADESH PALAKURTHI (2012), Intercontinental Hotels Group Chair of Excellence Professor, Director: B.S., 1988, Florida International University; M.S., 1991, Purdue University; Ph.D., 1995, The Pennsylvania State University; M.B.A., 2002, San Jose State University CAROL A. SIKES (2009), Assistant Professor: B.A., 1985, Western Illinois University; M.B.A., 2000, Nichols State University; Ph.D., 2007, Purdue University

INNA SOIFER (2013), Instructor: B.B.A., 2000, M.S., 2006, Udmurt State University, Russia

# Helen Hardin Honors College Faculty and Staff

MELINDA JONES, Ph.D., Director BETSY LOE, M.S., Assistant Director ROBERT YELLE, Ph.D., Assistant Professor of History and Honors PAUL MEGO, Ph.D., Honors Faculty Coordinator, Lambuth Campus

# **University Libraries Faculty and Staff**

SYLVERNA V. FORD, Ph.D., Dean

JOHN EDWARD EVANS (1980), Associate Professor: B.A., 1974, Kansas Wesleyan; M.S., 1977, University of Illinois; Ed.D., 1989, Memphis State University

SYLVERNA V. FORD (2000), Professor, Dean: B.S., 1972, M.L.S., 1974, University of Maryland; Ph.D., 1995, University of Pittsburgh EDWIN G. FRANK (1994), Associate Professor: B.A., 1976, Memphis State University; M.L.S., 1993, University of Tennessee, M.A., 1999, University of Memphis

MARY K. FREILICH (1985), Assistant Professor: B.A., 1970, M.A., 1971, Purdue University; M.L.S., 1982, State University of New York-Albany ANNELLE R. HUGGINS (1981), Associate Professor: B.S., 1969, Central State University; M.L.S., 1970, Vanderbilt University; M.Ed., 1975, Texas A&M University

ROBERT T. IVEY (1987), Associate Professor: A.B., 1966, M.A., 1968, Ph.D., 1973, M S.L.S., 1976, University of North Carolina-Chapel Hill JOYCE A. McKIBBEN (1979), Assistant Professor: B.A., 1971, Eckerd College; M.A.L.S., 1972, University of Kentucky; M.A. 1979, University of Florida

ANNA B. NEAL (1980), Assistant Professor: B.A., 1973, University of Kentucky; M.L.S., 1978, Vanderbilt University; M.M., 1986, Memphis State University

ELIZABETH H. PARK (1983), Professor: A.B., 1966, Stanford University; M.L.S., 1972, State University of New York at Buffalo; M.S. 1989, Memphis State University

MARGARET ROBINSON (1994), Associate Professor: B.A., 1983, Centenary College; M.L.S., 1992, Indiana University

PERVEEN K. RUSTOMFRAM (1995), Associate Professor: B.S.W., 1979, Bombay University: M.A., 1984, University of Hyderabad; M.L.S., 1987, University of Tennessee