

Academic Departments and Programs

#### **DEPARTMENT CHAIR**

John Reinard

### **DEPARTMENT OFFICE/WEBSITE**

College Park 420-1 657-278-3517

http://communications.fullerton.edu/humancomm

#### **PROGRAMS OFFERED**

Bachelor of Arts in Communicative Disorders

Master of Arts in Communicative

Disorders

Credential in Speech-Language Pathology Services Credential in Language, Speech and Hearing

Bachelor of Arts in Speech Communication

Emphases:

Argumentation and Persuasion, Intercultural Communication, Interpersonal Communication, Organizational Communication, Communication Studies

Minor in Speech Communication

Master of Arts in Speech Communication

#### **FACULTY**

Jon Bruschke, K. Jeanine Congalton, Michael Davis, Marcia Dankins, Tenzin Dorjee, Robert Gass, Nise Bloomfield Frye, Javette Hayes, Minjung Kim, Kurt Kitselman, Edith Li, Patty Malone, Irene Matz, Toni Nielson, John Reinard, Gary Ruud, Terry Saenz, Hye-Kyeung Seung, Jason Teven, Erika Thomas, Stella Ting-Toomey, Kenneth Tom, Ying-Chiao Tsao, Toya Wyatt.

### INTRODUCTION

The mission of the department is to provide students with an understanding of communication processes in a culturally diverse society. An in-depth understanding of communication processes brings a number of benefits, including the ability to analyze communication barriers and the competency to facilitate effective communication between individuals, within organizations, between organizations and their customers or constituencies, and across cultures. Our vision is to train good men and women speaking well to solve communication problems by studying the ways in which messages link participants during transactions. Understanding communication processes in depth can, with specialized education and training, also be used to diagnose and treat disorders of communication.

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

The following goals and learning outcomes have been established for students pursuing a degree in Speech Communication:

#### **Knowledge/Processes**

- Identify the basic elements of an argument, such as claim, grounds, and warrant, to
  apply the basis of "test evidence" to the proof or support offered by and advocate,
  and identify common fallacies in reasoning
- Demonstrate knowledge of basis postulates, theories, and models of human communication
- Demonstrate knowledge of the basic stock issues associated with propositions of value and propositions of policy and to advance an argumentative case, refute and opponent's case, and extend his or her own arguments

#### Skills

- Adapt a persuasive message to the audience's frame of reference, arrange the points into a hierarchy of coordinate and subordinate points, and display appropriate message-enhancing nonverbal behaviors
- Distinguish between independent and dependent variables in an experimental investigation and to identify the basic threats to validity in controlled laboratory investigations
- Demonstrate knowledge of communication research objectives and methods, utilize library resources to access appropriate scholarly information, and to develop and reference persuasive scholarly arguments in writing

#### **Attitudes**

 Identify and analyze core cultural value dimensions that shape communication behaviors For the goals and learning outcomes for students pursuing a degree in Communicative Disorders, see http://communications.fullerton.edu/humancomm/learning\_goals.htm.

# BACHELOR OF ARTS IN COMMUNICATIVE DISORDERS (120 UNITS)

The Bachelor of Arts in Communicative Disorders requires 42 units in the major; 39 of which are required and three are elective.

#### Sophomore Level (6 units)

HCOM 241 Introduction to Phonetics (3)

HCOM 242 Introduction to Communicative Disorders (3)

#### Junior Level (15 units)

HCOM 300 Introduction to Research in Speech Communication (3)

HCOM 307 Speech and Language Development (3)

HCOM 344 Anatomy and Physiology of Speech and Hearing (3)

HCOM 350 Speech and Hearing Science (3)

HCOM 352 Child Language and Phonological Disorders (3)

#### Senior Level (18 units)

HCOM 461 Audiology and Audiometry (3)

HCOM 465 Aural Rehabilitation (3)

HCOM 472 Voice and Craniofacial Disorders (3)

HCOM 474 Neurology and Neurogenic Communicative Disorders (3)

HCOM 475 Fluency Disorders (3)

HCOM 476 Clinical Methods and Procedures (3)

### Electives (3 units)

HCOM 302 Introduction to Sign Language (3)

HCOM 308 Quantitative Research Methods (3)

HCOM 312 Intermediate Sign Language (3)

HCOM 345 Communication and Aging (3)

HCOM 404 Communicative Disorders of the Bilingual/ Multicultural Child (3)

# BACHELOR OF ARTS IN SPEECH COMMUNICATION (120 UNITS)

The Bachelor of Arts in Speech Communication requires 42 units in the major, including 18 units of core requirements, 12 units of breadth experiences and 12 units within one of five emphases.

### Core Requirements (18 units)

HCOM 102 Public Speaking (3)

HCOM 200 Human Communication (3)

HCOM 235 Essentials of Argumentation (3)

OR HCOM 236 Essentials of Debate (3)

HCOM 300 Introduction to Research (3)

HCOM 308 Quantitative Research Methods (3)

HCOM 420 Communication Theory (3)

### **Breadth Experiences (12 units)**

HCOM 313 Interpersonal Communication Theory (3)

OR HCOM 318 Family Communication (3)

OR HCOM 413 Communication in Interpersonal Relationships (3)

OR HCOM 437 Internship - Speech Communication (3)\*

HCOM 324 Communicating in Groups and Teams (3)

OR HCOM 326 Organizational Communication Dynamics (3)

OR HCOM 433 Training and Development (3)

OR HCOM 437 Internship - Speech Communication (3)\*

HCOM 330 Rhetoric of Popular Culture (3)

OR HCOM 332 Processes of Social Influence (3)

OR HCOM 335 Advanced Argumentation (3)

OR HCOM 437 Internship - Speech Communication (3)\*

HCOM 320 Intercultural Communication (3)

OR HCOM 422 Applications of Intercultural

Communication (3)
OR HCOM 456 Intercultural Conflict: Theory and Practice (3)

OR HCOM 437 Internship - Speech Communication (3)\*

\*HCOM 437 must be taken with permission of internship instructor and must be in the specific Breadth Experience category to which it is applied. May be taken only once for credit.

### **Emphasis in Argumentation and Persuasion (12 units)**

HCOM 138/338 Intercollegiate Forensics (3)

HCOM 236 Essentials of Debate (3)

HCOM 330 Rhetoric of Popular Culture (3)

HCOM 332 Processes of Social Influence (3)

HCOM 334 Persuasive Speaking (3)

HCOM 335 Advanced Argumentation (3)

HCOM 337 Communication in the Legal Arena (3)

HCOM 342 America Speaks (3)

HCOM 426 Directing Forensics (3)

HCOM 432 Contemporary Rhetoric (3)

### **Emphasis in Intercultural Communication (12 units)**

HCOM 220 Interpersonal Conflict Management (3)

HCOM 320 Intercultural Communication (3)

HCOM 331 Sex and Gender in Human Communication (3)

HCOM 360 Nonverbal Communication (3)

HCOM 422 Applications of Intercultural Communication (3)

HCOM 435 Communication in Community Building and Civic Engagement (3)

HCOM 456 Intercultural Conflict: Theory and Practice (3)

HCOM 479 Mediation: Principles and Practice (3)

### **Emphasis in Interpersonal Communication (12 units)**

HCOM 220 Interpersonal Conflict Management (3)

HCOM 313 Interpersonal Communication Theory (3)

HCOM 318 Family Communication (3)

HCOM 324 Communicating in Teams and Groups (3)

HCOM 331 Sex and Gender in Human Communication (3)

HCOM 360 Nonverbal Communication (3)

HCOM 413 Communication in Interpersonal Relationships (3)

HCOM 440 The Dark Side of Interpersonal Communication (3)

#### **Emphasis in Organizational Communication (12 units)**

HCOM 220 Interpersonal Conflict Management (3)

HCOM 324 Communicating in Teams and Groups (3)

HCOM 325 Interviewing: Principles and Practices (3)

HCOM 326 Organizational Communication Dynamics (3)

HCOM 333 Communication in Business and the Professions (3)

HCOM 433 Training and Development (3)

HCOM 437 Internship: Speech Communication (3)

HCOM 445 Leadership: Toxic and Intoxicating (3)

HCOM 479 Mediation: Principles and Practice (3)

### **Emphasis in Communication Studies (12 units)**

An emphasis in Communication Studies provides students with the opportunity to focus on two of the emphases. The selection of courses must be adviser-approved and from at least two of the emphases.

#### **MINOR IN SPEECH COMMUNICATION (18 UNITS)**

An understanding of the challenges of effective communication and how communication can be facilitated is of great value in almost any career. Some careers, such as those in human services, require an understanding of communication between individuals. Other careers, such as those in business, nonprofit organizations or government, require an understanding of communication within and between organizations and between organizations and their customers or other constituencies. For example, business majors may benefit from knowledge and skills in organizational and multicultural communication, particularly in our multicultural society. The Minor in Speech Communication is structured to meet the individual student's aptitudes, interests and career goals.

# MASTER OF ARTS IN COMMUNICATIVE DISORDERS (30 UNITS)

The Master of Arts in Communicative Disorders (speech-language pathology and audiology), accredited by the Council on Academic Accreditation of the American Speech-Language-Hearing Association since 1969, is designed to: (1) provide students with graduate, professional level studies covering the broad field of communicative disorders; (2) provide students with opportunities to observe, learn and

serve communicatively impaired clients within a wide range of clinical facilities, both on- and off-campus; and (3) train students to assess, diagnose and formulate therapy plans and to function as therapists for selected types and populations of the communicatively impaired.

# MASTER OF ARTS IN SPEECH COMMUNICATION (30 UNITS)

The Master of Arts in Speech Communication is designed to give students broad exposure to theory and research and, at the same time, allow them to specialize in one area (i.e., argumentation and persuasion, interpersonal communication, intercultural communication, organization communication, or rhetorical studies). The objectives of the degree include improving the student's academic and professional competence, preparing the student for advanced graduate work toward the doctoral degree, developing the student's research capabilities, increasing student's knowledge in the area of specialization, and for the student planning a teaching career, providing the opportunity to develop teaching skills. The student is expected to demonstrate a high degree of intellectual competence and scholarly discipline, to evaluate critically and to demonstrate mastery of the field of specialization.

#### Admission to Graduate Standing - Conditionally Classified

Applicants must meet the university requirements for admission to conditionally classified graduate standing: a baccalaureate from an accredited institution and a grade-point average of at least 3.0 in the last 60 semester units attempted is preferred. Applicants for the Communicative Disorders Program must have a baccalaureate in communicative disorders or the equivalent. The equivalent consists of a prescribed list of courses which total 36 semester units and which form an appropriate background for graduate studies. Applicants for Speech Communication are required to have a baccalaureate in speech communication or an allied field or complete nine units of approved background studies in speech communication.

In addition, the following factors will be taken into consideration by the Graduate Committee in determining who shall be admitted to the program:

- Grade-point average
- Letters of recommendation (preferably on department forms)
- Professional objectives as presented in a student letter of intent

#### **Graduate Standing - Classified**

A student who meets the requirements for conditionally classified graduate standing, as well as the following requirements, may be granted classified graduate standing upon the development of an approved study plan:

- Enrollment in HCOM 501, Seminar in Speech-Language
   Pathology, is a pre-classification requirement for the M.A. Degree in Communicative Disorders
- Enrollment in HCOM 500, Research in Speech Communication is required within the first nine units of graduate work included on the study plan

 Completion of the study plan with 30 units of studies approved by an adviser and the Department Graduate Committee

### **GRADUATE STUDY PLAN (GSP)**

Requirements for the M.A. Degree in Communicative Disorders consist of a minimum of 30 units of study approved by the Department Graduate Committee. These are:

- Courses totaling 15 units, HCOM 500, Research in Speech Communication, taken in the first nine units of GSP coursework; HCOM 542, Neurologic and Clinical Aspects of Speech, Language and Cognition; HCOM 543, Seminar in Dysphagia; HCOM 576, Seminar in Augmentative and Alternative Communication; and HCOM 577, Seminar in Child Language Disorders
- Five 500-level academic courses in communicative disorders totaling 15 units, which may include either HCOM 597, Directed Graduate Research, or HCOM 599, Independent Study
- Comprehensive exams are taken in ten areas throughout the course of graduate study when prerequisite coursework has been completed

Requirements for the M.A. Degree in Speech Communication consist of a minimum of 30 units of 400- and 500-level courses approved by the Department Graduate Committee. These are:

- Courses totaling 15 units, HCOM 500, Research in Speech Communication, taken in the first nine units of GSP coursework; HCOM 536, Seminar in Communication and Rhetorical Theory; and three additional 500-level seminars
- Completion of 30 units of coursework and passing a comprehensive examination, or completion of 27 units of coursework and writing a project (HCOM 597, Directed Graduate Research) for three units, or completion of 24 units of coursework and writing a thesis (HCOM 598) for six units

For further information, consult the Department of Human Communication Studies.

# SPEECH-LANGUAGE PATHOLOGY SERVICES CREDENTIAL IN LANGUAGE, SPEECH AND HEARING

Speech pathologists who wish to practice in the public school setting are required to obtain an M.A. Degree in Communicative Disorders and the Speech-Language Pathology Services Credential in Language, Speech and Hearing (SLPSC), which they may declare as an objective when they apply for admission to the graduate program. The credential may also be declared as an objective at a later time as long as the student has maintained continuous enrollment in the graduate program. After the student leaves the graduate program, re-admission is required in order to fulfill requirements for the credential. It is, therefore, strongly recommended that students complete the credential while working on the M.A. Degree unless they are absolutely certain that they will not later wish to work in the public schools.

To obtain the SLPSC, students must earn the M.A. degree in Communicative Disorders. In addition, they must meet requirements that are somewhat more specific than those for the M.A. Degree alone. These requirements are listed below.

The required courses and clinical practice for the SLPSC must be completed with a grade-point average of 2.50 and at least a "C" (2.0) must be earned for each course and practicum. In the case of credit/no credit grades for certain clinical practicum courses, the student must earn a credit. Students are required to complete clinical clock hours according to the requirements of the American Speech-Language-Hearing Association. Some of the clinical clock hours must be in audiology and aural rehabilitation. In addition, 100 of the 350 supervised clock hours must be completed at a school site or its equivalent. The hours must be supervised in all cases by persons holding the ASHA Certificate of Clinical Competence in Speech-Language Pathology and the appropriate state license. The supervisor of the public school practicum must also hold the Clinical Rehabilitative Services Credential on the SLPSC. If equivalences have been granted for a clinical practicum that was completed at another university, appropriate documentation of clinical clock hours completed at the other institution must be provided to the Communicative Disorders Program so that it can be placed in the student's clinical practicum file.

Finally, the student must demonstrate proficiency in reading and writing through passing the University Examination in Writing Proficiency (EWP) and through obtaining a "C" (2.0) or better in HCOM 300 Introduction to Research in Speech Communication.

Alternatively, the student may demonstrate reading and writing proficiency by obtaining a "C" (2.0) or better in HCOM 500 Research in Speech Communication. Students must also pass the CBEST Exam prior to entering the credential program. The Credential Coordinator should be contacted by the students early in their program to review requirements and give further information on the requirements for the credential.

### **Academic and Clinical Practicum Requirements**

Undergraduate courses from related areas:

PSYC 361 Developmental Psychology (3)

SPED 371 Exceptional Individual (3)

# M.A. Degree and Graduate-Level Courses in Communicative Disorders

Academic courses in the major. The following courses are required for the SLPSC, but some of them may also be used for the partial fulfillment of requirements for the M.A. Degree. Additional graduate study plan coursework is also required for the M.A. degree.

HCOM 404 Communicative Disorders of the Bilingual/ Multicultural Child (3)

HCOM 490 Seminar: Speech and Hearing Services in the Schools (2)

HCOM 571 Seminar in Fluency Disorders (3)

HCOM 573 Seminar in Voice Disorders (3)

HCOM 574 Seminar in Phonological Disorders (3)

HCOM 576 Seminar in Augmentative and Alternative Communication (3)

#### **Clinical Practicum Requirements**

HCOM 458 Clinical Practicum: Speech and Language Disorders in Children (3)

HCOM 468 Audiology Practicum (1)

HCOM 485 Aural Rehabilitation Practicum (1)

HCOM 489A Public School Practicum in Communicative Disorders (4)

HCOM 558A Clinical Practicum: Speech and Language Disorders in Adults (3)

HCOM 558C Clinical Practicum: Communicative Disorders and Differences in Individuals from Diverse Backgrounds (3)

HCOM 558D Clinical Practicum: Augmentative Communication and Instrumental Management of Communicative Disorders (2)

HCOM 559A Advanced Clinical Practicum: Communicative Disorders (3)

# CERTIFICATION, LICENSURE AND CREDENTIALS IN COMMUNICATIVE DISORDERS

#### Certification

The Communicative Disorders program is fully accredited by the Council on Academic Accreditation in Audiology and Speech-Language Pathology (CAA) of the American Speech-Language-Hearing Association (ASHA). Graduate study in this program leads to certification in speech-language pathology with ASHA (CCC-SLP).

The CCC-SLP is awarded by the American Speech-Language-Hearing Association to persons who (a) complete the M.A. Degree in speech-language pathology, (b) complete the required clinical practicum by taking prescribed combinations of clinical practicum courses, (c) achieve all required knowledge-based and skill-based competencies, (d) pass the National Examination in Speech-Language Pathology, (e) successfully complete a Clinical Fellowship Year and (f) submit the appropriate application materials to the American Speech-Language-Hearing Association. All students should be familiar with the requirements for the CCC-SLP. All students should obtain a copy of the latest ASHA Membership and Certification Handbook during the last year of their graduate studies, and they should read all materials carefully. Their advisers are not responsible for informing students of ASHA requirements that are to be met after graduation. Copies of the Handbook are available from the Graduate Assistant in the CSUF Speech and Hearing Clinic or directly from ASHA at the following address and telephone number:

> American Speech-Language-Hearing Association Membership and Certification Section 2200 Research Blvd. Rockville, Maryland 20850 Telephone 800-498-2071

#### Licensure

The speech-language pathology license is required to work as a speech-language pathologist in all settings in California except for the public school and in certain exempt federal employment settings. The license is awarded by the Speech-Language Pathology and Audiology Board (SLPAB) of the Medical Board of California to those who (a) complete the M.A. Degree in speech-language pathology, (b) complete the required clinical practicum by taking prescribed practicum courses, (c) pass the National Examination in Speech-Language Pathology, (d) successfully complete a Required Professional Experience (RPE) and (e) submit the appropriate application materials to SLPAB.

Although students will have met or exceeded the academic and clinical practicum requirements for licensure in California by the time they complete their M.A. degree and the last of the clinical practicum courses that are required for the Certificate of Clinical Competence in Speech-Language Pathology (ASHA), they should still become familiar with the specific requirements for licensure during their last year of graduate studies. A copy of the "Student Manual for Licensure in Speech Pathology and Audiology" may be obtained from the Graduate Assistant in the CSUF Speech and Hearing Clinics or directly from SLPAB at the following address and telephone number:

Speech-Language-Pathology and Audiology Board 2005 Evergreen Street, Suite 2100 Sacramento, CA 95815 Telephone 916-263-2666

#### **SPEECH COMMUNICATION COURSES**

Courses are designated as HCOM in the class schedule.

#### 100 Introduction to Human Communication (3)

Theory and practice of interpersonal communication. Practice in the development of skills for improving the quality of communication is required.

### 102 Public Speaking (3)

Theory and presentation of public speeches, including an analysis of determinants of comprehension and attitude formation; selection and organization of speech materials, development of delivery skills and evaluation of message effectiveness. Student presentations required. Participation in research projects.

#### 138 Forensics (3)

Prerequisite: consent of instructor. Investigation and practice in the background, format procedures and evaluation criteria of the various forensic events. Students must participate in at least two intercollegiate speech tournaments. May be repeated for credit. (More than 6 hours of class work for each unit of credit)

#### 200 Human Communication (3)

Theories and competencies in interpersonal, small group, public, organizational and intercultural communication. Variations in communication processes across contexts are investigated.

### 220 Interpersonal Conflict Management (3)

Nature, causes and structure of interpersonal conflict; communication strategies exhibited in conflict and intervention principles for conflict management. Conflict management theory is applied to conflicts within marriages, small groups, organizations and intercultural relationships.

#### 235 Essentials of Argumentation (3)

Methods of critical inquiry and advocacy. Identify fallacies in reasoning, testing evidence and evidence sources; advance a reasoned position; and defend and refute arguments. Analysis and evaluation of oral and written arguments.

#### 236 Essentials of Debate (3)

Theory and practice in activity of debate, emphasizing skill in analysis and reasoning, researching and organizing evidence, evaluating stock issues relating to policy and value propositions and engaging in regulation.

#### 241 Introduction to Phonetics (3)

Analysis and description of speech at the segmental and suprasegmental levels. Practice using the International Phonetic Alphabet for broad and narrow transcription. Overview of speech production.

#### 242 Introduction to Communicative Disorders (3)

Broad overview of disorders of communication, including classification and prevalence. Educational and training requirements for speech-language pathology and audiology, professional settings and opportunities, ethical considerations, clinical observations.

### 300 Introduction to Research in Speech Communication (3)

Prerequisites: HCOM 100 or 200, open only to speech communication majors. Understanding and using professional literature in speech communication and using it to generate a formal research paper. A minimum grade of "C" fulfills the course requirement of the university upper-division baccalaureate writing requirement for speech communication and communicative disorders majors.

### 301 Liberal Studies in Communication Processes (3)

Interdisciplinary study and its relationships to communication theory. How communication occurs in various disciplines. Theories about the nature of language and how this influences the pursuit of learning. No credit for speech communication majors.

#### 302 Introduction to Sign Language (3)

Prerequisites: HCOM 100 or 102; ENGL 101. Overview of the deaf experience and the options for communication in the deaf community. Use of American Sign Language and finger spelling at the introductory level.

### 303 Biology of Human Communication (3)

Prerequisite: BIOL 101 or PSYC 101. Biology and evolution of speech and language. Speech production, evolution and development; speech perception; language, hemispheric specialization, clinical studies; current methods in neurolinguistics; and plasticity and aging.

#### 307 Speech and Language Development (3)

Prerequisite: completion of General Education Category I.A. or LING 106 or equivalent. Normal acquisition of phonology, morphology, semantics, syntax and pragmatics in children. Biological, cognitive and social bases of language acquisition. Meets the requirements for specialized preparation to serve as a teacher of exceptional children. (Same as LING 307)

### 308 Quantitative Research Methods (3)

Prerequisite: HCOM 100 or 200. Current perspectives in empirical research methodology in the discipline of Speech Communication. Experimental designs, common statistical tests and the use of the computer as a research tool.

#### 312 Intermediate Sign Language (3)

Prerequisite: HCOM 302 Theory, practice and grammatical features of American Sign Language at the intermediate level.

Students gain an understanding of the deaf cultural perspective.

#### 313 Interpersonal Communication Theory (3)

Prerequisites: HCOM 100, 200. Behavioral and humanistic approaches to theories of interpersonal communication. Functions of communication that influence interpersonal relationships, including communicator characteristics, information exchange, situational demands and interpersonal evaluations.

### 318 Family Communication (3)

Prerequisite: HCOM 200. Research and theory in family communication. Role of communication in courtship, family satisfaction, family conflict and family dysfunction, with emphasis on marital, parent-child sibling and intergenerational family relationships.

#### 320 Intercultural Communication (3)

Prerequisite: HCOM 100. Communication problems that result when members of different cultures communicate. How interpersonal communication can overcome differences in cultures' perceptions of communication's functionality, value orientations, nonverbal behavior, language, epistemologies and rhetorics.

#### 322 Study Abroad Seminar (1)

Corequisite: enrollment in the CSU International Programs or California State University, Fullerton Exchange Programs. Orientation to living in another culture for students studying abroad. Intercultural adaptation process (e.g., culture shock) and understanding host nationals' behavior.

### 324 Communicating in Teams and Groups (3)

Prerequisites: HCOM 100, 200. Application of communication theories and behavioral research findings as they relate to small groups and teams. Communication facilitation among individuals in task realization, including interpersonal needs, leadership, norms, roles, verbal and nonverbal messages and group systems and procedures.

#### 325 Interviewing: Principles and Practices (3)

Prerequisite: HCOM 100. Principles and practices of interviewing processes. Consideration of appraisal, counseling, employment, exit, journalistic, persuasive and survey types of interviews. Case analyses, simulations and community fieldwork required.

#### 326 Organizational Communication Dynamics (3)

Prerequisites: HCOM 100, 200. Interrelationships between management and communication theories. Microsystems and macro-systems within an organization are emphasized in terms of intra-personal, interpersonal, small group and organizational communication theories.

#### 330 Rhetoric of Popular Culture (3)

Corequisite: HCOM 200. Rhetorical theories as they apply to contemporary communication events. Various perspectives of rhetorical theory are utilized to further understanding of communication in today's society.

#### 331 Sex and Gender in Human Communication (3)

Prerequisite: HCOM 100 or 200. Rhetorical dimensions of sex and gender American communication contexts. Explanation and evaluation of the creation and maintenance of masculinity and femininity in American culture from a rhetorical perspective.

# 332 Processes of Social Influence (3)

Prerequisite: HCOM 100 or 200. Major theories of communication concerned with influence and persuasion in society.

Communication effectiveness through strategic application of theory to effecting change and evaluating appeals for change by others.

#### 333 Communication in Business and the Professions (3)

Prerequisite: HCOM 100 or 200. Human behavior, structural demands and communication within organizations. Application of theory and behavioral research as a framework for generating managerial communication competencies such as inter-viewing, briefings, conference leadership and intergroup coordination.

#### 334 Persuasive Speaking (3)

Prerequisite: HCOM 102 or equivalent. Strategies and tactics appropriate to leading social policy persuasive campaigns. Analysis of receiver variables, progressive use of persuasive materials, question and answer techniques and the development of personal influence. Student presentations required.

#### 335 Advanced Argumentation (3)

Prerequisite: HCOM 236 or equivalent. Argument as applied to advocacy; logic and evidence as related to analysis of significant issues.

### 337 Communication in the Legal Arena (3)

Prerequisite: an upper-division writing requirement course. Influence of communication behaviors on civil and criminal judicial processes. Review and evaluation of research into communication variables and legal practices, from interviewing to closing arguments. Courtroom observation required.

#### 338 Intercollegiate Forensics (3)

Prerequisite: consent of instructor. Directed activity in debate and other forensic events. Participation in intercollegiate speech competition is required for credit. May be repeated for credit. (More than 6 hours of class work for each unit of credit.)

#### 340 Asian American Communication (3)

(Same as ASAM 340)

### 342 America Speaks (3)

Prerequisites: HCOM 100, 102 or POSC 100; HIST 110A or 110B. America's story told through the speeches that moved her. In addition to critical evaluation of significant messages, emphasis is placed on what it would have been like to be part of the American audience exposed to famous speeches and speakers.

#### 344 The Anatomy and Physiology of Speech and Hearing (3)

Anatomy and physiology of the speech and hearing mechanism. Processes of respiration, phonation, articulation-resonance and hearing are included.

#### 345 Communication and Aging (3)

Prerequisite: HCOM 100. Communicative changes found in older adults including normal and pathologic changes in the physiological and behavioral aspects. Topics include diagnosis, rehabilitative strategies, social implications and health care systems.

### 350 Speech and Hearing Science (3)

Prerequisites: HCOM 241 and 344. Physiology and acoustics of speech production, including voice, resonance and individual speech segments. Instrumentation for the acoustic and perceptual analysis of speech.

### 352 Child Language and Phonological Disorders (3)

Prerequisites: HCOM 241 or LING 351; HCOM 242 and 307. Language and phonological disorders in children. Speech/language profiles of special populations and contemporary approaches to assessment and intervention. Includes practice in the analysis of child speech/language samples.

### 360 Nonverbal Communication (3)

(Same as LING 360)

### 404 Communicative Disorders of the Bilingual/ Multicultural Child (3)

Prerequisites: HCOM 241, 242, 307, and 352. Comparative analysis of different versus delayed or deviant speech/language development of children from various cultural, ethnic and linguistic backgrounds. Principles of clinical management of children from culturally diverse populations.

# 407 Speech-Language Development and Disorders for Educators (3)

Prerequisite: SPED 371 or 400. Monolingual and bilingual speech-language development and disorders, including characteristics of children with potential speech-language problems and techniques for assisting them in classroom settings.

#### 413 Communication in Interpersonal Relationships (3)

Prerequisite: HCOM 313. Communication in the interpersonal relationship development setting with particular emphasis on current theoretical and methodological issues.

# 420 Communication Theory (3)

Prerequisites: HCOM 200, 300, 308, or graduate standing. Various theories and perspectives on human communication. Understanding basic forms of theories and developing theoretical perspectives on human communication.

### 422 Applications of Intercultural Communication (3)

Prerequisite: HCOM 320. Nature and effects of intercultural communication within multicultural/multinational organizations. Intercultural leadership, negotiation, decision-making and communication competence. Analyze and practice a number of intercultural training approaches.

#### 426 Directing Forensics (3)

Prerequisites: HCOM 138, 338. Philosophies of forensics education, including coaching, judging and tournament administration. Strategies of implementation of these philosophies. May be repeated for credit.

#### 430 Classical Rhetoric (3)

Prerequisites: six units of upper-division coursework in Human Communication Studies including HCOM 300. Significance of rhetoric and oratory in Greek and Roman intellectual life from the fourth century B.C. to 300 A.D. Contributors include Protagoras, Isocrates, Plato, Aristotle, Cicero, Quintilian and Augustine.

### 432 Contemporary Rhetoric (3)

Prerequisites: six units of upper-division major courses.

Theories of how cultures and individuals manage meaning in public communication, including speeches, campaigns, print and electronic media. Applies classical, modern and contemporary critical frameworks of analysis.

#### 433 Training and Development (3)

Prerequisites: HCOM 324 or HCOM 326, and HCOM 308. Communication in a training and development environment with particular emphasis on learning principles, instructional design, implementation and evaluation of training and needs assessment.

# 435 Communication in Community Building and Civic Engagement (3)

Prerequisites: HCOM 100 and junior standing. Human dialogue and "talk" in the development of a democratic society. Barriers to community dialogue/building and civic engagement will be examined. Relevant communication procedures, methods and theories will be examined and applied.

#### 437 Internship: Speech Communication (3)

Prerequisites: any two of the following courses: HCOM 301, 324, 326, 333, 420 or consent of instructor. On-site involvement with communication frameworks as they function in ongoing organizational settings. Working in an organization and seminar activities. Application for internship must be submitted prior to enrollment.

#### 438 Principles of Rhetorical Criticism (3)

Prerequisites: six units of upper-division communication theory and process courses to include HCOM 300. Explanation and evaluation of rhetorical experience. Historical modes of criticism, issues in rhetorical criticism, criticism in various contexts and experiences in criticism.

#### 440 The Dark Side of Interpersonal Communication (3)

Prerequisite: HCOM 200 or 313; or graduate standing. Social scientific literature regarding the "dark side" of communication, which includes aspects of communication that are poorly understood, understudied and/or classified as destructive, dysfunctional, evil, immoral, malicious, criminal or abusive.

#### 445 Leadership: Toxic and Intoxicating (3)

Prerequisite: completion of upper-division writing requirement in a major. Leadership from a communication theory perspective. Leadership dynamics to help gain insight into leadership and the influences.

# 456 Intercultural Conflict: Theory and Practice (3)

Prerequisite: HCOM 320. Relationship between intercultural conflict theory and practice. Key cultural patterns that impact conflict. Theoretical and applied perspectives on intercultural conflict across contexts will be emphasized.

# 458 Clinical Practicum: Speech and Language Disorders in Children (3)

Prerequisites: HCOM 352 and 476; concurrent enrollment in 574 or 577; admission to the graduate program in communicative disorders; approved Clinical Practicum Plan. Supervised experience in the assessment and treatment of children with speech and language disorders. Weekly individual and group conferences. Approximately 25-40 clinical clock hours. May be repeated for credit.

### 461 Audiology and Audiometry (3)

Prerequisites: HCOM 242 and 344. Characteristics of hearing disorders, including etiologies and risk factors. Methods and procedures used in assessing the auditory system including current topics of interest. Partially fulfills the requirements for state audiometrist certificate.

#### 465 Aural Rehabilitation (3)

Prerequisite: HCOM 461. Effects of hearing loss on speech and language. Treatment of hearing disorders, including amplification and aural rehabilitation. Role of the audiologist and speech-language pathologist in the management of hearing disorders.

#### 468 Audiology Practicum (1)

Prerequisites: HCOM 461 and approved Clinical Practicum Plan. Audio-metric evaluations, including pure tone testing, hearing aid evaluations, impedance audiometry and report writing. Provides 10-15 clinical clock hours in audiology.

#### 472 Voice and Craniofacial Disorders (3)

Prerequisites: HCOM 241, 242 and 344. Disorders of voice; disorders of articulation and resonance caused by orofacial pathology. Anatomical and physiological bases, assessment, diagnosis, management and interdisciplinary aspects.

### 474 Neurology and Neurogenic Communicative Disorders (3)

Prerequisites: HCOM 241, 242, 307 and 344. Anatomy and physiology of the nervous system as they relate to speech, language, hearing and swallowing. Clinical characteristics of neurogenic language disorders, apraxia of speech and dysarthria. Contemporary approaches to assessment and treatment. Lecture, demonstration and clinical observations.

# 475 Fluency Disorders (3)

Prerequisites: HCOM 241, 242, 307 and 344. Theories of development and remission of stuttering, constitutional and environmental risk factors. Clinical characteristics of stuttering. Contemporary approaches to assessment and treatment. Lecture, demonstration, clinical observations and exercises.

### 476 Clinical Methods and Procedures (3)

Prerequisites: HCOM 241, 242, 307, 344, 352; and 472, 474 or 475. General principles and procedures for assessment and treatment of individuals with communicative disorders. Lecture, demonstration, clinical observations and supervised clinical experience.

### 479 Mediation: Principles and Practice (3)

Prerequisite: HCOM 200. Principles and practices of mediation as dispute intervention. In addition to lectures and class exercises, students become participants in mediated dispute role-play scenarios. Knowledge gained should serve students throughout their personal and professional lives.

#### 485 Aural Rehabilitation Practicum (1)

Prerequisites: HCOM 461, 465, and 458 or 558A; and approved Clinical Practicum Plan. Supervised rehabilitation of hearing-impaired children and adults in on- and off-campus facilities. Provides 10-15 clinical clock hours in aural rehabilitation. Sign language background recommended. Credit/no credit only.

#### 489A Public School Practicum in Communicative Disorders (4)

Prerequisites: HCOM 458, 543, 558A, 571, 573, 574 and 577; concurrent enrollment in HCOM 490; admission to the graduate program in communicative disorders; approved Clinical Practicum Plan; and passing score on CBEST; application approved prior to semester of practicum. Meets the directed teaching requirements for the Speech-Language Pathology Services Credential. Approximately 100-150 clinical clock hours.

#### 489B Advanced Public School Practicum (3)

Prerequisites: HCOM 489A; admission to the graduate program in communicative disorders; approved Clinical Practicum Plan; application approved prior to semester of practicum. Advanced clinical practice in the public school setting. Meets the directed teaching requirements for the Clinical Rehabilitative Service Credential. Approximately 100 hours of supervised clinical practicum with children.

#### 490 Seminar: Speech and Hearing Service in Schools (2)

Prerequisites: concurrent enrollment in HCOM 489A and admission to the graduate program in communicative disorders. Problems and challenges unique to the student clinician in the organization and management of the speech and hearing program in the school. Clinician's role; planning, scheduling, case finding, treatment program reporting and other responsibilities.

# 492T Proseminar in Speech Communication (3)

Prerequisites: appropriate theoretical coursework and consent of instructor. Current research topics in the concentration areas of persuasion and argumentation, interpersonal communication, intercultural communication and organizational communication will be presented. May be repeated for credit for a different topic.

### 496 Student-to-Student Tutorials (1-3)

Consult "Student-to-Student Tutorials" in this Catalog for a more complete course description.

# 499 Independent Study (1-3)

Open to upper-division students in speech communication only with signed consent form from department chair.

# 500 Research in Speech Communication (3)

Prerequisites: HCOM 300, 308 or equivalent; admission to M.A. program. Research design and methods used in historical, descriptive and experimental research in speech communication.

### 501 Seminar in Speech-Language Pathology (1)

Prerequisite: admission to the M.A. program in communicative disorders. Introduction to requirements for M.A. degree in communicative disorders, including requirements for demonstrating knowledge-based and skill-based competencies. Students start a portfolio for documentation of competencies and demonstrate a number of competencies within this course. Credit/no credit only. May be repeated three times for credit.

#### 509 Qualitative Research Methods (3)

Prerequisite: HCOM 300. Perspectives in qualitative research methodology in Speech Communication (ethnography, naturalistic inquiry, case study, phenomenological research, textual/content analysis, archival analysis). Interpretive design; application of standards; data analysis; reporting conclusions.

# 510 Seminar in Interpersonal and Relational Communication (3)

Prerequisites: HCOM 324, 313 and 420. Theoretical and empirical examination of interpersonal and relational communication. Generation of theoretical frameworks and/or heuristic models of concepts and process under investigation.

#### 520 Seminar in Group Communication (3)

Prerequisite: HCOM 324. Small group communication theory. Small group variables, methods and outcomes and group process as a learning tool.

#### 522 Seminar in Intercultural Communication (3)

Prerequisite: HCOM 320. Theory and methodology in intercultural communication research. Specific variables examined include attribution, values, communication competence and acculturation/ adaptation. Practice in completing original research in intercultural communication.

#### 525 Seminar in Organizational Communication (3)

Prerequisites: HCOM 324, 326 and 420. Theoretical postulates concerning managerial and organizational communication. Research findings and case studies relating to communication determinants and organizational effectiveness. Communicative relationships among individuals, the work unit and the organization.

#### 535 Seminar in Argumentation and Persuasion (3)

Prerequisites: HCOM 332, 334 or 335. Leading theories and empirical research on argumentation and persuasion. Strategies of effective advocacy and compliance-gaining. Laboratory research and applied settings. Ethical issues related to argumentation and persuasion.

#### 536 Seminar in Communication and Rhetorical Theory (3)

Prerequisite: admission to the graduate program in speech communication. Analysis of rhetorical and communication theories. Comparisons and contrasts of the epistemological bases of empirical and humanistic inquiry.

# 542 Neurologic and Clinical Aspects of Speech, Language and Cognition (3)

Prerequisite: admission to the graduate program in communicative disorders. Neuroanatomy as it relates to speech, language and cognition; neuropsychological bases of consciousness, attention, sensation, perception, higher mental functions, language and motor speech; emphasis on assessment, diagnosis, prognosis and management of neurogenic communicative disorders.

#### 543 Seminar in Dysphagia (3)

Prerequisites: HCOM 542; admission to the graduate program in communicative disorders. Theory and clinical aspects of dysphagia. Physiology of normal swallow, etiologies of dysphagia, clinical and instrumental assessment, diagnosis and management.

# 544 Seminar in Neurogenic Speech, Language and Cognitive Disorders (3)

Prerequisites: HCOM 542; admission to the graduate program in communicative disorders. Theory and clinical aspects of neurogenic speech, language and cognitive disorders. Standardized and informal assessment, differential diagnosis, prognosis and management, including evaluation of the validity of clinical practice guidelines through the analysis of published research.

# 554 Seminar in Multicultural Issues in Communicative Disorders (3)

Prerequisites: HCOM 404 and admission to the graduate program in communicative disorders. Critical review of current theory and research on the clinical management of clients from culturally/linguistically diverse populations. Opportunities for practical applications of research through case study review and laboratory activities.

# 558A Clinical Practicum: Speech and Language Disorders in Adults (3)

Prerequisites: HCOM 472, 474, 475, 476, 542 and admission to the graduate program in communicative disorders and approved Clinical Practicum Plan. Supervised experience in assessment and treatment of adults with speech and language disorders. Weekly individual and group conferences. Approximately 25-40 clinical clock hours. May be repeated for credit.

# 558B Clinical Practicum: Diagnosis in Communicative Disorders (2)

Prerequisites: HCOM 476, admission to the graduate program in communicative disorders and approved Clinical Practicum Plan. Supervised experience in assessment and diagnosis of speech and language disorders. Develop an understanding of procedures and process of clinical supervision. Approximately 10-20 clinical clock hours. May be repeated for credit.

# 558C Clinical Practicum: Communicative Disorders and Differences in Individuals from Diverse Backgrounds (3)

Prerequisites: HCOM 404; 458, 558A and admission to the graduate program in communicative disorders and approved Clinical Practicum Plan. Supervised experience in assessment and treatment of clients from culturally/linguistically diverse populations. Between 10 and 20 clinical clock hours, depending on units. May be repeated for credit.

# 558D Clinical Practicum: Augmentative Communication and Instrumental Management in Communicative Disorders (2)

Prerequisites: HCOM 458 or 558A, 576, or concurrent enrollment, admission to the graduate program in communicative disorders and approved Clinical Practicum Plan. Practice using software programs and equipment for instrumental assessment and for augmentative and alternative communication. Approximately 5-20 clinical clock hours. May be repeated for credit.

# 559A Advanced Clinical Practicum: Communicative Disorders (3)

Prerequisites: HCOM 458, 543, 558A, 571, 573, 574, 576, 577; admission to the graduate program in communicative disorders; and approved Clinical Practicum Plan. Advanced clinical practice under supervision with children and/or adults. Off-campus program in hospitals, clinics and other rehabilitation facilities. Approximately 150 clinical clock hours.

# 559B Advanced Clinical Practicum: Communicative Disorders (1-3)

Prerequisites: HCOM 458, 543, 558A, 571, 573, 574, 576, 577; admission to the graduate program in communicative disorders; and approved Clinical Practicum Plan. Advanced clinical practice, under supervision with children and/or adults. Off-campus program in hospitals, clinics and other rehabilitation facilities. Approximately 50 clinical clock hours per unit. May be repeated for credit.

# 564 Autism Spectrum Disorders in Speech-Language Pathology (3)

Prerequisites: HCOM 577 and admission to the graduate program in communicative disorders. Communication disorders in children with autism spectrum disorders (current theories, diagnostic process, co-occurring conditions, the role of speech-language pathologists in multi-disciplinary approaches to assessment and intervention planning, critical review of relevant research).

### 571 Seminar in Fluency Disorders (3)

Prerequisites: HCOM 308, 475, or equivalent. Reading assignments, seminars, lectures and case reviews to enable students to develop a framework for understanding the etiology and maintenance of stuttering and to develop their own approaches to assessment and treatment.

### 573 Seminar in Voice Disorders (3)

Prerequisites: HCOM 472 and admission to the graduate program in communicative disorders. Review classification of voice disorders (perceptually); examine instrumental assessment of such disorders (acoustically); and emphasize a comprehensive physiological, perceptual and acoustic work-up of individual cases.

#### 574 Seminar in Phonological Disorders (3)

Prerequisites: HCOM 352 and admission to the graduate program in communicative disorders. Developing critical thinking and analytical skills related to current issues in linguistic theories on the assessment and treatment of phonological disorders in children.

# 576 Seminar in Augmentative and Alternative Communication (3)

Prerequisite: admission to the graduate program in communicative disorders. Historical service delivery approaches; symbol sets and systems; assessment and management strategies for persons with severe physical and speech impairments; advocacy approaches for the disabled.

#### 577 Seminar in Child Language Disorders (3)

Prerequisites: HCOM 352 and admission to the graduate program in communicative disorders. Principles of language assessment and intervention based on psycho-linguistic theory and current research on language disordered children. Development of critical thinking and analytical skills related to the assessment and treatment of language disorders in children.

### 595 Pedagogy in Communication Studies (3)

Prerequisite: admission into master's program in Speech Communication or instructor consent. Pedagogical research, theory and practice in communication studies. Practice in use and evaluation of instructional strategies. Topics covered are relevant to teach associations for HCOM 100 and HCOM 102.

### 597 Directed Graduate Research (3)

Prerequisite: HCOM 500. Individual research study, under the supervision of the chair of the student's advisory committee.

# 598A Thesis (2)

Prerequisite: HCOM 500. The selection, investigation and written presentation of a selected problem in the field of speech.

### 598B Thesis (2)

Prerequisite: HCOM 500. The selection, investigation and written presentation of a selected problem in the field of speech.

#### 598C Thesis (2)

Prerequisite: HCOM 500. The selection, investigation and written presentation of a selected problem in the field of speech.

#### 599 Independent Graduate Research (1-3)

Open to graduate students only with signed consent form from department chair. May be repeated for credit.

#### INTRODUCTION

The Bachelor of Science in Human Services is a carefully articulated program providing the academic and experiential background for the student seeking a career working with people in the varied and expanding field of human services. An application-oriented major, it is based on a synthesis of knowledge from several social sciences, together with methodologies of intervention at the individual, group and community levels. Human services graduates are educated to respond in an informed way to identifiable human service needs in a variety of settings. The program's orientation and its synthesis of knowledge from many background disciplines, as well as its focus on the development of specific methods and practical skills to apply this knowledge, give it a unique perspective.

The Human Services major is structured around four interrelated components: theoretical foundations/intervention strategies; client population/cultural diversity; research/evaluation; and skill development/field experience.

About half of the graduates of the Human Services program go on to graduate programs, typically in social work, counseling, psychology, public administration or education. A human services professional may provide direct services to clients, supervise personnel, administer programs and develop policies, and/or deliver support services to professional staff. Sample career options for Human Services graduates include adoption counselor, AIDS services case manager, child protective service worker, client advocate, community educator, elementary school teacher, geriatric caseworker, human services agency administrator, parent educator, policy analyst, probation officer, social service employee, youth counselor and behavior specialist.

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

The following goals and learning outcomes have been established for students pursuing a degree in Human Services:

#### Intellectual inquiry, critical thinking, and problem solving

- Understand, interpret, and analyze relevant theories, research design, sampling methodology and measurement
- Evaluate human services programs and critique information provided by media and other primary and secondary sources
- Integrate and evaluate information to draw reasonable conclusions based on evidence
- Articulate ideas, taking into consideration purpose, audience and presentation mode

# Professional, reflective, field-based practice with culturally diverse populations in changing communities

 Demonstrate interviewing, case management, crisis intervention, assessment, and cultural competence skills

### **DEPARTMENT CHAIR**

Mikel Hogan

#### **DEPARTMENT OFFICE/WEBSITE**

Education Classroom 405 657-278-8444 http://hdcs.fullerton.edu/husr

#### **PROGRAMS OFFERED**

Bachelor of Science in Human Services Minor in Human Services

### **FACULTY**

John Doyle, Joe Albert Garcia, Mikel Hogan, Melanie Horn-Mallers, Kristi Kanel, Lorraine Klein, Susan Larsen, Trent Nguyen, Lori Phelps, Carl Renold, James Ruby, Mia Sevier

- Exhibit knowledge of the purpose, structure and processes of community organizations and government agencies focused on human services through the lifespan, and demonstrate an ability to use that knowledge effectively to serve and enhance diverse communities
- Understand that the needs of populations are multifaceted and dynamic and are best addressed from a collaborative, reflective, and interdisciplinary approach

### Communication and information technology skills

- Demonstrate collaborative communication with individuals, families and communities
- Articulate knowledge and skills to communicate effectively about human services issues using written and oral communications
- Use information technology to support human services delivery and implementation

# BACHELOR OF SCIENCE IN HUMAN SERVICES (120 UNITS)

The Bachelor of Science in Human Services requires 54 units in the major, including 36 units of required core courses, plus 18 units of adviser-approved courses related to one's anticipated professional specialization.

Majors must achieve a grade of "C" (2.0) or better in all courses included in the core curriculum and in the advisement track. It is the student's responsibility to consult the department academic adviser at least once during each of her/his first two semesters on campus to develop a study plan identifying courses for the advisement track.

# **Community College Transfer Students**

Community college transfer students may apply a maximum of 12 units of coursework in human services and related fields towards the total of 54 units. Transfer of any units must be approved by the department adviser. For transfer students with a certificate in Substance Abuse, Domestic Violence or Gerontology, up to 18 units of coursework in human services may be applied to the total of 54 units

### Required Core Curriculum (36 Units)

Theoretical Foundation/Intervention (9 units)

HUSR 201 Introduction to Human Services (3)

HUSR/COUN 380 Theories and Techniques of Counseling (3)

HUSR 310 Case Management (3)

Client Populations/Cultural Diversity (9 units)

AFRO/HUSR 311 Intracultural Socialization Patterns (3)

CAS 312 Human Growth and Development (3)

OR PSYC 361 Developmental Psychology (3)

PSYC 341 Abnormal Psychology (3)

OR SOCI 351 Sociology of the Family (3)

Research/Evaluation (9 units)

HUSR 315 Research and Data Management in Human Services (3)

HUSR 385 Program Design and Proposal Writing (3)

HUSR 470 Evaluation of Human Services Programs (3)

Skills Development/Field Experience (9 units)

HUSR 396 Practicum Seminar (2) and HUSR 396L Practicum (1)

HUSR 495 Fieldwork Seminar (2) and HUSR 495L Fieldwork (1)

HUSR 496 Internship Seminar (2) and HUSR 496L Internship (1)

Note: The practicum/ fieldwork/ internship courses (HUSR 396 and 396L, 495 and 495L and 496 and 496L) must be taken in sequence. Only one fieldwork course may be taken in a given semester. Students may substitute one semester of HUSR 490 Group Leadership for a fieldwork course.

# Required Advisement Track (18 units)

In addition to the core, the human services degree program requires each student to select, in consultation with an adviser, an 18-unit advisement track in the area of her/his anticipated professional specialization. Advisement tracks include:

Mental Health Track (Emphasis in counseling and social work)

Prepares students for entry-level career options such as adoption counselor, client advocate, social service employee, youth counselor and parent educator, and for graduate work in counseling, social work, clinical psychology or marriage and family therapy.

Administration and Community Practice Track

Designed for students wishing to pursue careers and/or graduate study in human services agency administration, community organization, social policy and planning; prepares students for entry level career options such as outreach worker, fundraiser, grant writer and data manager.

Gerontology Track

Developed for students interested in working with the elderly population as a geriatric caseworker or client advocate and graduate work in gerontology.

Substance Abuse Treatment and Prevention Track

Designed for students who are interested in careers such as drug and alcohol counselor and rehabilitation case manager. Once students complete a Bachelor's Degree in Human Services with this track, they are eligible to take the California Association for Alcohol/Drug Educators Certification Exam.

Elementary Education Track

Designed for students who are interested in pursuing an elementary teaching career.

Persons with Disabilities Track

Developed for students interested in working with physically and/or developmentally disabled population in human services or educational settings.

Individualized Advisement Track

Students may develop their own track in consultation with the Human Services Department Faculty Adviser

*Note*: HUSR 300 is required in the Mental Health advisement track and should be taken early in the program.

#### **MINOR IN HUMAN SERVICES (21 UNITS)**

The minor in Human Services may be of interest to students preparing for careers in the helping professions, as well as students with a personal interest in this field. The minor provides a structured selection of courses offered by the program that can complement other majors and minors by providing practical applications of theory, foundations, self-exploration and supervised fieldwork in a human services setting.

# **Required Foundation Courses (9 units)**

HUSR 201 Introduction to Human Services (3)

HUSR 311 Intracultural Socialization Patterns (3)

HUSR 380 Theories and Techniques of Counseling (3)

#### Electives (3-9 units)

HUSR 300, 310, 315, 318, 350, 385, 400, 410, 411, 412, 415, 416, 420, 425T, 430, 434, 435, 436, 450, 465, 470, 475, 480

#### Fieldwork (3-9 units)

HUSR 396/396L, 490, 495/495L, 496/496L

Equivalent practicum/internship course from a related University department.

### **HUMAN SERVICES COURSES**

Courses are designated as HUSR in the class schedule.

### 196 Student-to-Student Tutorial (1-3)

Prerequisite: approval of Department Chair. Tutoring experience with peers needing special assistance on a one-to-one basis or in small group settings. Credit/no credit only, does not count toward the Human Services major/minor or G.E. requirement.

#### 201 Introduction to Human Services (3)

Origin and scope of human services, including theoretical frameworks, the functions and activities of human services organizations, and the roles and related skills of human services workers.

# 300 Character and Conflict (3)

Prerequisite: consent of instructor at first class meeting. Experiential, theme-oriented class exploring life choices in the struggle for personal autonomy. Themes include body image, sex roles, love, sexuality, intimacy, marriage, loneliness, death, meaning and values. Credit/No Credit only.

### 310 Case Management (3)

Pre- or corequisite: HUSR 201. Principles and critical issues in case management, along with the various models of service delivery. Special attention given to the diverse populations utilizing case management systems. Collaborative and interagency services will be examined. One or more sections offered online.

#### 311 Intracultural Socialization Patterns (3)

(Same as AFRO 311)

#### 315 Research and Data Management in Human Services (3)

Prerequisites: completion of General Education (G.E.) Category B.4. and HUSR 201. Basic research and assessment skills appropriate to the delivery of human services. Introductory skills relating to library search techniques, evaluation of research articles, computer based data analysis, tracking of client progress and implications for human services. One or more sections offered online.

### 318 Human Services for Immigrants and Refugees (3)

Pre- or corequisite, HUSR 201 or equivalent or 311. U.S. immigration policy for newcomers; stressors and cultural influences on coping behaviors and explores culturally sensitive models of human service delivery with an emphasis on Southeast Asian, Latino and Soviet immigrants and refugees. One or more sections offered online.

#### 350 Leadership Skills and Personal Development (3)

Prerequisites: completion of G.E. Categories A.1, A.2 and D.1. Leadership concepts and skills, including psychological process, conflict resolution, counseling and human service skills. Help students become aware of their personal leadership styles; maintaining vitality through physical and mental health will be stressed. One or more sections offered online. (Same as COUN 350)

#### 380 Theories and Techniques of Counseling (3)

Prerequisites: junior/senior standing and completion of G.E. Category D.1. Contemporary theories and techniques of counseling. Counseling process, comparison of various theoretical approaches, introduction to professional and ethical issues. Taught partially online. One or more sections offered online. (Same as COUN 380)

# 385 Program Design and Proposal Writing (3)

Prerequisites: HUSR 315 or an elementary social science statistics course, HUSR 396 and 396L. Techniques of program design, budgeting and staffing of human service programs; proposal writing and fund development methods; survey of needs assessment procedures. One or more sections offered online.

#### 396 Practicum Seminar (2)

Prerequisites: HUSR 201 or equivalent and HUSR 380 or 310. Corequisite: HUSR 396L. Functions and structure of human services agencies; interrelationships with community services; the role of the human services worker; ethical, legal and professional issues. One or more sections offered online.

#### 396L Practicum (1)

Prerequisites: HUSR 201 or equivalent and HUSR 310 or 380. Corequisite: HUSR 396. Field placement in one or more human service agencies for a minimum of eight hours per week. Credit/No Credit only.

#### 400 Ethical and Professional Issues in Human Services (3)

Prerequisite: HUSR 201 or 380. Ethical, legal and professional issues facing the human services worker. Designed to teach a process of ethical decision-making and to increase awareness of the complexities in practice. Offered online only. (Same as PHIL 400)

#### 410 Crisis Intervention for Para-Professionals (3)

Prerequisite: HUSR 201 or equivalent. Theories and techniques of short-term intervention and subsequent referral procedures. Topics include suicide, battering, AIDS, rape, death, dying and human-induced disasters in the community.

### 411 Human Services Delivery to Communities (3)

Prerequisite: AFRO/HUSR 311. Provides a framework for identifying the human service needs of varied community groups and focuses on the utilization of this knowledge about those groups in order to develop effective service delivery strategies.

#### 412 Gerontology in Human Services (3)

Prerequisite: HUSR 201 or equivalent. Gerontology and human services practice and policy focusing on historical developments and content of key social, legislative and governmental programs designed for older adults, including the Social Security Act, Older Americans Act and Medicare. Offered online only.

#### 415 Treatment Issues in Drug Addiction (3)

Prerequisite: HUSR 380. Treatment issues and theoretical models involved in the treatment of drug dependencies. Emphasizes specific effects of different drug classifications; understanding drug cultures; women, children and elderly addiction; co-dependency and enabling.

#### 416 Group Process and Membership (1)

Prerequisites: HUSR 300, 380. Didactic and experiential overview of stages of group development, impact of members on group identity, group member and leader issues. Survey of various counseling groups. May be repeated for credit. Credit/No Credit only.

### 420 Human Services Management (3)

Prerequisite: advanced standing. Corequisite, HUSR 201. Issues in administration and management of human services in community agencies. Topics include assessing client needs, designing human service delivery systems, program budgeting, marketing strategies, accountability and improving program management.

### 425T Contemporary Issues in the Human Services (3)

Prerequisite: HUSR 201 or equivalent. Systematic study and theory, research findings and intervention strategies related to contemporary issues faced by paraprofessional human service workers. May be repeated for credit under different topic. Offered online only.

#### 430 Child Abuse and the Human Services (3)

Prerequisite: HUSR 201 or equivalent. Types and symptoms of abuse, assessment techniques, legal and ethical issues, family dynamics pertaining to children, adolescents and adults abused as children. Special topics include networking and referral, utilizing community resources and prevention. One or more sections offered online.

#### 434 Physiological Effects of Alcohol and Other Drugs (3)

Prerequisite: HESC 321 or equivalent. Pharmacological actions of drugs of abuse and how these relate to the physiological, psychological and behavioral effects of such drugs. Properties of recreational, "street" drugs and of prescription drugs that lead to abuse and/or dependence are covered. Not available for use on a graduate study plan. One or more sections offered online.

### 435 Drug Abuse Prevention and Early Intervention (3)

Prerequisite: HUSR 434 or 415 or HESC 321. History, theories and models in the drug prevention field. Theoretical foundations and conceptual frameworks that have been used in the field will be presented. Major research and evaluation outcomes on the effectiveness of prevention strategies are examined. Not available for use on a graduate study plan. One or more sections offered online.

#### 436 Dynamics of Substance Abuse Treatment in Families (3)

Prerequisite: HESC 321 or HUSR 415. Explore and apply methods of assisting significant others, organizations and communities to understand, treat and prevent substance abuse and dependence. Develop practice strategies that will prepare them to deliver services at the micro, meso and macro levels. Not available for use on a graduate study plan.

# 437 Co-Occurring Disorders: Assessment, Treatment and Referral (3)

Prerequisite: HUSR 201. Concepts, definitions and features of co-occurring mental disorders and substance-related disorders in individuals seen in human services settings; includes screening, assessment, case management and service delivery for such individuals. Not applicable to graduate degree requirements.

# 440 Abuse of Persons with Disabilities: Assessment, Evaluation and Intervention (3)

Prerequisites: HUSR 201, 380. Abuse towards persons with disabilities via the context of assessment, evaluation and intervention. Societal and cultural factors that promote abuse towards persons with disabilities. Offered online only.

# 445 Persons with Disabilities and Human Services Community Support systems (3)

Prerequisite: HUSR 201. Diversity model approach to human service practice for persons with disabilities. Topics include societal and professional stereotypes, disability, culture, disability groupings, guidelines for practice with persons with disabilities, systems and community support for persons with disabilities. Offered online only.

#### 465 Human Services Delivery to Latinos (3)

Prerequisite: HUSR 201. Theory, research findings and intervention strategies related to contemporary issues faced by paraprofessional human service workers in working with Latino populations. Cultural competence when serving Latinos in mental health, social welfare and educational agencies.

#### 450 Theory and Practice of Group Counseling (3)

Prerequisites: HUSR 300, 380 and consent of instructor. Critical evaluation of 10 contemporary theoretical approaches to group counseling, as well as issues in group work. Emphasizes applying theories and techniques to actual group situations.

### 470 Evaluation of Human Services Programs (3)

Prerequisite: HUSR 385. Making program objectives measurable; determining appropriate methodology and techniques to evaluate effectiveness, efficiency and process variables; practical problems of program evaluation. One or more sections offered online.

#### 475 Human Services Policy and Practice (3)

Prerequisite: advanced standing. Pre- or corequisite, HUSR 201. Relationship between policy and practice. Problem of inequities and inequalities in the distribution of resources through social policies and social welfare programs. Particular attention is paid to how policy impacts service delivery to disenfranchised groups. Offered online only.

### 480 Case Analysis and Intervention Techniques (3)

Prerequisites: HUSR 380, 396, 396L. Psychodynamic principles of evaluation, diagnosis and intervention; techniques of counseling appropriate to diverse populations; application of a psychoanalytic perspective to the diagnostic categories of the DSM-IV.

### 490 Practicum in Group Leadership (3)

Prerequisites: HUSR 300, 380 and consent of instructor. Supervised experience as a group leader. Approaches and techniques of group leadership. May be used as a substitute for 495/495L or 496/496L. Coordinator approval needed for substitution for 495/495L or 496/496L. May be repeated once for credit.

#### 495 Fieldwork Seminar (2)

Prerequisites: HUSR 396, 396L. Corequisite: HUSR 495L. Classroom analysis of agency experience focusing on skills and techniques of human service workers and organizational analysis. One or more sections offered online.

#### 495L Fieldwork (1)

Prerequisites: HUSR 396, 396L. Corequisite: HUSR 495. Supervised fieldwork in one or more human service agencies for a minimum of eight hours per week. Credit/No Credit only.

### 496 Internship Seminar (2)

Prerequisites: HUSR 495 and 495L; or HUSR 490 when taken in lieu of 495 and 495L; and at least two courses in approved specialization. Corequisite: HUSR 496L. Supervised internship in a community service agency in area of specialization. Seminar consists of group supervision and discussion of cases. One or more sections offered online. Credit/No Credit only.

#### 496L Internship (1)

Prerequisites: HUSR 495 and 495L; or HUSR 490 when taken in lieu of 495 and 495L. Corequisite: HUSR 496. Requires 120 hours of supervised internship experience in one or more human service agencies in one semester. One or more sections offered online. Credit/No Credit only.

#### 499 Independent Study (1-3)

Prerequisites: approval of coordinator, consent of instructor, upper-division status. Individual research project, either library or field, under the direction of a faculty member. May be repeated for credit. Only three units per semester.

# Information Systems and Decision Sciences

Mihaylo College of Business and Economics

#### **DEPARTMENT CHAIR**

Bhushan Kapoor

#### **DEPARTMENT OFFICE/WEBSITE**

Steven G. Mihaylo Hall 4113 657-278-2221 www.business.fullerton.edu/isds

#### **PROGRAMS OFFERED**

Bachelor of Arts in Business Administration

Concentrations:

Information Systems Management Science Joint Emphasis in Accounting and Information Systems

Minor in Information Systems

Master of Business Administration

Concentrations:

Business Intelligence Information Systems Management Science

Master of Science in Information Systems

Concentrations:

E-Commerce Decision Sciences

Master of Science in Information Technology

# **FACULTY**

Rahul Bhaskar, Shu-Jen Chen,
Tammy Drezner, Zvi Drezner, Zvi
Goldstein, Seyed Hanizavareh, Pawel
Kalczynski, Bhushan Kapoor, Malini
Krishnamurthi, Mabel Kung, William
Lau, Laura Marcoulides, Do Le Minh,
Sinjini Mitra, Michael Newby, Barry
Pasternack, Sorel Reisman, Joseph
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#### **INTRODUCTION**

The Information Systems and Decision Sciences Department offers courses in Information Systems, Management Science, Statistics and Logistics, and Business Intelligence.

Information systems are computer-based systems that aid management in making decisions and assist in implementing and controlling management policies. They are used in business, industry and government operations. Applications include airline reservations, banking transactions, crime prevention networks, election returns, real estate assessment, tax records, newspaper databases, sports statistics and computer assisted learning.

Management science (also known as operations research) is the application of the scientific method to decision-making in business and government. Nearly all management science problems involve solutions using computers. Operations research uses mathematical and simulation models to provide decision-makers with quantitative information pertaining to complex business situations. Statistics assists decision-makers by using techniques designed to draw inferences from experimental and sampling data.

Logistics deals with the movement of materials and finished goods. It encompasses such areas as inventory control, transportation, purchasing, warehouse management and information support systems. Logistical control is an important component of the success of most manufacturing and service enterprises. It is also used extensively in complex organizations such as airline companies and the military.

Business intelligence is a broad field consisting of a variety of business processes for data management and a wide range of analytical tools for performing data analysis to make better strategic and tactical business decisions. Business processes for data management include methods for planning, collecting, storing and structuring data into databases and data warehouses. Analytical tasks include querying, reporting, visualizing, generating online active reports and running advanced analytical techniques for clarification, segmentation and prediction (e.g., data mining).

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

### **B.A.** Business Administration

The following goals and learning outcomes have been established for students pursuing a bachelor's degree in Business Administration:

Problem solving and critical thinking skills

• Effectively use quantitative/analytical, problem-solving and critical thinking skills in a business situation

#### Interpersonal relations

- Motivate self and others to achieve group and organizational goals
- Diagnose and resolve conflict in group and organizational settings

#### Ethical awareness

• Demonstrate an awareness of ethical issues and responsibilities

#### Functional knowledge

 Understand and appreciate the principles and roles of each of the major business disciplines and the interrelationships of these disciplines within a strategic framework

#### Multicultural awareness

 Appreciate diversity and understand how workforce and market diversity challenge, benefit and influence the activities of the organization

### Information technology skills

Use information technology to support business analysis and operations

#### Global awareness

Understand the impact of the global economy and business environment

### Economic and legal environment knowledge

 Demonstrate knowledge about the economic and legal environments in which business operates

#### Communications skills

 Demonstrate knowledge and skills to communicate effectively about business issues using written and oral communications

### M.S. Information Systems/E-Commerce Concentration

The following goals and learning outcomes have been established for students pursuing a master's degree in Information Systems or E-Commerce concentration:

#### Telecommunications

- Assess the telecommunications needs of an organization
- Supervise the development of a local or wide-area data and communications network
- Use the Internet in support of operations
- Select the appropriate telecommunications hardware and software

### Managerial

- Be familiar with the terminology and basic principles of business information systems and the Internet
- Understand ethical, global, political, social, legal, regulatory, environmental and technology issues
- Understand the impact of demographic diversity on organizations

### Systems development process

- Analyze the information systems needs of an organization
- Design an information system to serve the needs of an organization

#### Data needs

- Design a database system to serve the needs of an organization
- Select appropriate software to operate a database system

### Programming concepts

- Write a computer program using the fundamental concepts of programming
- Document a program
- Select a particular computer language for a programming application

#### Collaboration

 Work productively in a team or collaborative setting to achieve common goals

#### Research

 Conduct, evaluate and synthesize research, and apply theoretical ideas to practical settings

#### Communications

 Effectively present ideas in a logical framework in a variety of forms with proper language structure and mechanics

# BACHELOR OF ARTS IN BUSINESS ADMINISTRATION, MINOR IN INFORMATION SYSTEMS, MASTER OF BUSINESS ADMINISTRATION

For information on the minor in Information Systems, as well as the Information Systems and Management Science concentrations within the B.A. and MBA, please refer to the "Business Administration" programs section of this catalog.

# MASTER OF SCIENCE IN INFORMATION SYSTEMS (30 UNITS)

Concentrations in the M.S. in Information Systems include E-commerce and Decision Sciences. For students with an undergraduate degree in business administration with a concentration in information systems, the curriculum may be completed in 1 1/2 years (full time) or 2 1/2 years (part time). Students with a bachelor's degree in a field other than business administration are eligible to apply; however, such students will be required to complete additional courses or demonstrate proficiency as described under the Curriculum requirements.

Cal State Fullerton is the only university in Orange County accredited by the AACSB International at both the undergraduate and graduate level for both accounting and business administration.

Most graduate courses in the Mihaylo College of Business Administration and Economics require "classified MCBE status" and are open only to students with classified standing in the M.S. in Information Systems, M.S. in Taxation, M.A. in Economics, MBA or M.S. in Accountancy programs.

### **Admission Requirements**

Admission is competitive. Applicants will be evaluated based on the following:

- Acceptable bachelor's degree from an appropriately accredited institution
- Minimum grade point average of at least 2.5 in the last 60 semester units attempted and in good standing at the last college attended
- Satisfactory score on the Graduate Management Admission Test (GMAT) or Graduate Record Exam (GRE). Students must score in the top 50 percent on the verbal, quantitative and analytical writing areas
- A bachelor's degree with a major in business administration equivalent to the degree as offered at CSUF with at least an overall cumulative grade point average of 3.0 (B). The degree must include calculus and software applications equivalent to passing MATH 135, Business Calculus and ISDS 265, Introduction to Information Systems and Applications, with grades of at least "C" (2.0). Courses in the major that are more than seven years old must be evaluated/validated for currency. Courses with grades lower than "C" (2.0) must be repeated
- For international students, a minimum score of 570 on the TOEFL paper exam or 90 on the internet based (iBT) is required
- Recommendation from the ISDS Admission Committee
  based upon a review of the above requirements, the student's
  "Statement of Purpose" and prior work experience. Additional
  coursework may be required of conditionally admitted students
  who holistically satisfy the criteria but are weak in one of the
  above areas

### Curriculum

At least 21 of the 30 units required for the Master of Science in Information Systems degree must be at the 500 level. In lieu of the Information Systems study plan, students may choose a concentration in either E-commerce or Decision Sciences.

An overall 3.0 (B) GPA is required in study plan courses and all applicable coursework. Any study plan course with a grade lower than "C" (2.0) must be repeated with at least a "C" (2.0) grade.

Students admitted with a bachelor's degree in a field other than business administration will be required to complete the following additional course requirements or their equivalent (either prior to or during their residency at CSUF):

MATH 135 Business Calculus (3)

ISDS 265 Introduction to Information Systems and Applications (3) ISDS 309 Introduction to Operating Systems and Programming (3)

ISDS 361A Quantitative Business Analysis: Probability and Statistics (3)

OR ISDS 513 Statistical Analysis (3) with a "C" (2.0) or better

Business foundation courses

ACCT 510 Financial Accounting (3)

ECON 515 Microeconomic Perspective for Managers (3)

OR MGMT 339 Principles of Management and Operations (3)

FIN 320 Business Finance (3)

ISDS 514 Decision Models for Business and Economics (3)

MGMT 518 Legal and Ethical Environment of Business (3)

OR MKTG 351 Principles of Marketing (3)

These courses must be completed with at least a 3.0~(B) overall grade point average and with grades of "C" (2.0) or better in each course.

#### **INFORMATION SYSTEMS STUDY PLAN**

ISDS 309 (or equivalent) is a prerequisite to many courses and should be taken prior to the beginning of the program.

#### **Required Core Courses (12 units)**

ISDS 550 Business Data Communications (3)

ISDS 551 Information Resources Management (3)

ISDS 552 Systems Analysis, Design and Development (3)

ISDS 555 Business Databases: Design and Processing (3)

#### Electives (15 units)

Five courses (15 units) to be selected in consultation with and approved by the student's adviser. Additional electives to those below may be available. Students should contact the department office for a current listing. Note that students who do not have an undergraduate degree in Information Systems must take ISDS 411 as an elective.

*Note*: No more than nine units of electives may be at the 400 level.

ISDS 411, 415, 418, 431, 433, 435, 437, 442, 474, 521, 553, 554, 556, 557, 558, 563, 565, 568, 576

Students may use one applied management science course and one applied business course as electives. The applied management science course may be selected from the following:

ISDS 526, 560, 561

The applied business course elected may be selected from the following: ACCT 511, ECON 502, FIN 517, MGMT 444

#### **Terminal Evaluation (3 units)**

ISDS 577 Seminar in Information Systems Implementation (3)

Students must complete the individual project in ISDS 577 with a grade of "B" (3.0) or better. In exceptional cases, a thesis (BUAD 598) may serve as an option to the individual written project. See the departmental graduate adviser for details.

#### E-COMMERCE CONCENTRATION

Background prerequisites for the E-Commerce Concentration are ISDS 309 and 371, or equivalent.

#### Required Core Courses (12 units)

ISDS 516 Introduction to Logistics Analysis Techniques (3)

ISDS 550 Business Data Communications (3)

ISDS 552 Systems Analysis, Design and Development (3)

ISDS 555 Business Databases: Design and Processing (3)

# Required Electives (15 units)

ISDS 553 Electronic Commerce: Analysis and Evaluation (3)

ISDS 554 E-Commerce: Technological Perspective (3)

ISDS 558 Advanced Software Development with Web Applications (3)

MGMT 540 New Venture Leadership and Management (3)

MKTG 455 Strategic Internet Marketing (3)

#### **Terminal Evaluation (3 units)**

ISDS 577 Seminar in Information Systems Implementation (3)

Students must complete the individual project in ISDS 577 with a "B" (3.0) or better. In exceptional cases, BUAD 598 (thesis) may serve as an option to the individual written project. See the departmental graduate adviser for details.

#### **DECISION SCIENCES CONCENTRATION**

#### Required Courses (9 units)

ISDS 415 Principles of Business Intelligence (3)

ISDS 526 Forecasting, Decision Analysis and Experimental Design (3)

ISDS 560 Advanced Deterministic Models (3)

OR ISDS 561 Advanced Probabilistic Models (3)

#### Statistics Course (3 units minimum)

One or more of the following:

ISDS 422 Surveys and Sampling Design and Applications (3)

ISDS 461 Statistical Theory for Management Science (3)

ISDS 467 Statistical Quality Control (3)

ISDS 472 Design of Experiments (3)

ISDS 473 Applied Business Forecasting (3)

ISDS 474 Data Mining for Managers (3)

ISDS 475 Multivariate Analysis (3)

#### ISDS Electives (15 units maximum)

ISDS 465, 490,516, 551, 552, 553, 555; 560 or 561; 563

Electives Outside ISDS (6 units maximum)

ACCT 511

ECON 502

FIN 517

MGMT 524, 535

#### **Terminal Evaluation (3 units)**

ISDS 576 Business Modeling and Simulation (3)

Students must complete the individual project in ISDS 576 with a "B" (3.0) or better. In exceptional cases, BUAD 598 (thesis) may serve as an option to the individual written project. See department graduate adviser for details.

# MASTER OF SCIENCE IN INFORMATION TECHNOLOGY (30 UNITS)

Subject areas required for a M.S. in Information Technology are programming, accounting, data communications, management of an IT organization, systems analysis and design, e-commerce and database development.

### **Admission Requirements**

Applicants will be evaluated based on the following:

- Acceptable bachelor's degree from an appropriately accredited institution
- Minimum grade-point average of at least 2.5 in the last 60 semester units attempted and in good standing at the last college attended
- Minimum of 2 years practical experience in a functional area of business
- Minimum average score of 530 on the GRE or a total scaled score of 530 on the GMAT
- Submission of a written self-assessment explaining why they believe they would be a good candidate for the program
- Successful passage of a phone or face-to-face interview designed to assess their level of technology knowledge, skills and abilities to be an online learner
- Proficiency in office productivity tools using a personal computer and knowledge and experience in utilizing Internet-based systems
- For international students, a TOEFL score of 570 on the paper exam is required

#### **Application Deadlines**

The deadline for completing an online application is March 1 for the following fall semester (see: www.csumentor.edu). Mailed applications need to be postmarked by the same deadline. However, the deadline may be changed based upon enrollment projections.

#### Curriculum

Each student is required to attend and successfully complete an on-campus orientation session for new students and maintain a GPA of 3.0. If circumstances force a student to fall out of the original cohort schedule, the student will be permitted to continue in the program, but will default to the next cohort cycle, provided the student remains in good academic standing.

#### **INFORMATION TECHNOLOGY STUDY PLAN**

#### Required Courses (21 units)

ACCT 509 Accounting for Information Technology (3)

ISDS 405 Programming Concepts for Information Technology (3)

ISDS 550 Business Data Communications (3)

ISDS 551 Information Resource Management (3)

ISDS 552 Systems Analysis, Design and Development (3)

ISDS 553 Electronic Commerce: Analysis and Evaluation (3)

ISDS 555 Business Databases: Design and Processing (3)

#### **Elective Courses (6 units)**

ACCT 507

ISDS 435, 518,521, 554, 556, 558

### Required Capstone Course (3 units)

ISDS 577 Seminar in Information Systems Implementation (3)

# INFORMATION SYSTEMS AND DECISION SCIENCES COURSES

Courses are designated as ISDS in the class schedule.

# 161 Discovering Business through Decision Science (1)

How businesses operate through tours of a number of manufacturing and service facilities. Emphasizes how businesses use quantitative analysis to improve operations.

### 162 Introduction to Excel Spreadsheets (1)

Introduction to the Excel spreadsheet with emphasis on business applications. Topics include how to enter data, formulas, functions and enhancing the worksheet to create graphs and databases. Students who take ISDS 265 cannot receive credit for ISDS 162.

#### 163 Electronic Research of Business Enterprises (1)

How to utilize electronic and non-electronic resources to research the history of a business. The resulting history will be published on the World Wide Web.

### 165 Navigating the Information Superhighway (1)

A hands-on course surveying information resources available through the Internet. Topics include e-mail, the World Wide Web, Internet search engines and computerized library resources.

#### 166 Developing Computer Based Presentations (1)

Concepts, principles and techniques for developing computerbased presentations. Create presentation outlines, use masters and templates, work with graphs and organization charts, and develop electronic slides and transparencies.

### 167 Practical Approach to Database Systems (1)

Hands-on methods to plan, create and maintain databases. Create customized forms and queries, as well as develop professional looking reports. Students who take ISDS 265 cannot receive credit for ISDS 167.

### 168 Mastering the World Wide Web (1)

How the World Wide Web works and how one can set up a website and author web pages. Topics include: web browsers, design of a website, HTML, multimedia, interactive techniques, CGI, security and site promotion.

#### 262 Visual Basic for Excel (1)

Prerequisite: ISDS 162 or equivalent. Introduction to the Visual Basic programming language that is a subset of the Excel spreadsheet. Students who take ISDS 265 cannot receive credit for ISDS 262.

### 265 Introduction to Information Systems and Applications (3)

Information systems, hardware, software, information systems concepts in business; telecommunications; e-commerce; enterprise systems; system development/acquisition; ethics, crime and security; microcomputer applications and hands-on exercises in the business arena.

### 309 Introduction to Programming (3)

Prerequisite: ISDS 265 or equivalent. Basic problem-solving techniques; structured programming principles; object-oriented programming principles; using GUI objects; handling events; processing files and streams.

#### 312 Database Management Systems (3)

Prerequisites: BUAD 301. Corequisite: ISDS 309. Concepts, principles and methods for analysis, design and implementation of database management systems; theory and practice; the relational model; issues and problems associated with developing single and multiple user applications both today and in the future; project required.

# 352 Advanced Data and Information Analysis in Business (3)

Prerequisites: FIN 320 and MKTG 351. Advanced spreadsheet topics for professional business, downloading of databases into spreadsheets and database packages and statistical analyses for decision support; database concepts and design; querying and report writing; applications to financial/ marketing forecasting models.

# 361A Quantitative Business Analysis: Probability and Statistics (3)

Prerequisites: MATH 135 and ISDS 265 or equivalents. Corequisite: BUAD 301. 2.5 cumulative GPA for online section registration. Probability concepts; expectations; descriptive statistics; discrete and continuous random variables; sampling; estimation; hypothesis testing; simple and multiple regression; nonparametric statistics

# 361B Quantitative Business Analysis: Statistics and Management Science (3)

Prerequisites: ISDS 361A; 2.5 cumulative GPA for online section registration. Quantitative methods and their application to business and economic problems. Forecasting, ANOVA, quality control, decision analysis, mathematical modeling, optimization, PERT/CPM, inventory.

### 371 C++ For Business Applications (3)

Prerequisites: ISDS 309. C++ syntax, structured programming, table handling, design standards, object oriented programming.

#### 372 Java Programming for Business Applications (3)

Prerequisites: ISDS 309. Java syntax and structure. Object oriented programming: classes, objects, association, inheritance, polymorphism. Business applications of Java. Use of Java packages. Web applications: applets and threads.

#### 405 Programming Concepts for Information Technology (3)

Prerequisite: admission to the Master of Science in Information Technology program. Application programming fundamentals for IT systems; structured and object-oriented programming, accessing and management of database tables and external files; layout design and data extraction for advanced output; testing, debugging and analysis tools.

### 406 Systems Analysis and Design (3)

Prerequisite: BUAD 301, ISDS 265, 312. Systems analysis and design for business information systems; systems development methodologies; managing changes to system parameters; systems process and data models; case tool types and their use; structured vs. object oriented analysis and design.

#### 409 Business Telecommunications for Information System Design (3)

Prerequisites: BUAD 301, ISDS 309. Pre- or corequisite: ISDS 406. Concepts for developing a data communication architecture to support Information Systems for a business enterprise. Requires students to undertake a group project to design a LAN.

# 411 Business Application Design (3)

Prerequisites: BUAD 301 and ISDS 309. Contemporary issues in the design and development of integrated, graphical user interface-based business applications.

#### 412 Statistics with SAS Applications (3)

Prerequisite: ISDS 361A. Statistical concepts beyond the basic applications. Uses SAS application program to solve statistical problems. Project required using concepts taught in the class.

#### 414 Internet Technologies and Applications (3)

Corequisites: ISDS 312. Contemporary Internet technologies and Web applications: Internet infrastructures, development of Web sites and dynamic Web pages, Web databases, business applications. Not applicable to graduate degree requirements.

# 415 Principles of Business Intelligence (3)

Prerequisites: BUAD 301, ISDS 312. Principles and procedures related to the design and use of expert systems and decision support systems principles in management decision making; development of expert systems using shells.

### 418 Privacy and Security (3)

Corequisites: BUAD 301 and ISDS 312. Security and privacy problems associated with the use of computer systems; ways to minimize risks and losses.

#### 422 Surveys and Sampling Design and Applications (3)

Prerequisites: BUAD 301, ISDS 361A. Principles for designing business and economic surveys. Applications in accounting, marketing research, economic statistics and the social sciences. Sampling; simple random, stratified and multistage design; construction of sampling frames; detecting and controlling non-sampling errors.

# 431 Enterprise Systems Implementation, Configuration and Use (3)

Prerequisite: MGMT 339. Methodology and tools for configuring an ERP system to support critical business processes. Topics include system modules, implementation tools and data settings. Focuses on configuring the system to support a variety of business scenarios.

#### 433 Enterprise Systems Administration (3)

Prerequisite: ISDS 310 or ISDS 552. Technical administration practices required to manage the day-to-day operations of an Enterprise Resource Planning (ERP) system. Topics include system architecture, security, system performance and installation of upgrades.

### 435 Integrated Enterprise Information Systems (3)

Prerequisites: MGMT 339. Application programming fundamentals for ERP systems; accessing and management of ERP database tables and external files; layout design and data extraction for advanced output; testing, debugging and analysis tools; security issues in an ERP system.

# 437 Enterprise Networks for Information Systems (3)

Prerequisite: ISDS 409 or ISDS 550. Placing the network in perspective within the overall enterprise that it serves, and the issues involved in constructing, updating and managing the networks which make up the infrastructure of those information systems.

#### 440 Integrative Decision Tools for Business Operations (3)

Prerequisites: BUAD 301, ISDS 361B. Intermediate management science modeling and solution techniques, including topics in linear and non-linear programming, integer programming, dynamic programming, Markov processes, queuing theory and inventory models.

#### 442 Business Modeling Using Spreadsheets (3)

Prerequisite: ISDS 361B or equivalent. Microsoft Excel will be used to implement business models. Excel will be used to effectively organize, analyze and present information. Examples include operations, production, marketing and finance. Macros, goal seek, solver, simulation and data tables.

# 443 Marketing Analytics Decision-Making in the Information Age (3)

(Same as MKTG 443)

### 454 Senior Project: Information Systems Development (3)

Prerequisites: BUAD 301, ISDS 312, 409. Integrates information systems development concepts of analysis, design and implementation. Students will develop an information system from concept to completion. Individual and team effort.

### 461 Statistical Theory for Management Science (3)

Prerequisites: BUAD 301, ISDS 361A. Mathematical topics needed for statistical theory. Distribution theory, moment generating functions, central limit theorem. Estimation theory, maximum likelihood. Hypothesis testing, Neyman-Pearson Lemma, likelihood ratio tests. Use of statistical software packages.

### 462 Applied Business Regression Analysis with SAS (3)

Prerequisite: ISDS 361A. Regression analysis where prediction models are developed to tackle a variety of business decision problems. Data issues and appropriate use of SAS software.

#### 465 Linear Programming in Management Science (3)

Prerequisites: BUAD 301; ISDS 361B or MATH 250B. Mathematical and theoretical foundations for linear programming; geometric and linear algebraic approaches and proofs; simplex method, duality, sensitivity and parametric analyses, extensions to specialized algorithms and large-scale models; practical and computer based applications will be discussed.

### 467 Statistical Quality Control (3)

Prerequisites: BUAD 301 and ISDS 361A. Control charts for variables, percent defective and defects. Tolerances, process capacity; special control charts, acceptance sampling and batch processing problems. Bayesian aspects of process control.

# 472 Design of Experiments (3)

Prerequisites: BUAD 301 and ISDS 361A. Corequisite: ISDS 440. Fundamentals of experimental design. Analysis of variance, factorial experiments, nested designs, confounding and factorial replications.

### 473 Applied Business Forecasting (3)

Prerequisites: BUAD 301 and ISDS 361A. Forecasting methods applied to problems in business and industry; practical multiple regression models with computer solutions; basic techniques in timeseries analysis of trend, cyclical and seasonal components; correlation of time-series and forecasting with the computer.

### 474 Data Mining for Managers (3)

Prerequisite: ISDS 361A or equivalent. Fundamentals of data mining. Topics may include association, classification, clustering, decision trees, statistical modeling and visualization. Motivation for the applications of data mining techniques. Use of data mining software suites on data sets.

### 475 Multivariate Analysis (3)

Prerequisites: BUAD 301 and ISDS 361A. The least squares principle; estimation and hypothesis testing in linear regression; multiple and curvilinear regression models; discriminant analysis; principle components analysis; application of multivariate analysis in business and industry.

#### 476 Web Mining and Text Mining (3)

Prerequisite ISDS 408; corequisite: 474. Fundamental concepts related to text (Web) document pre-processing and analysis. Topics include information extraction, structuring and dimension reduction, similarities between documents, classification, clustering, predictive modeling and social network analysis. Individual and group effort.

### 485 Wireless Business Networks for Information Systems (3)

Prerequisite: ISDS 409 or equivalent. Concepts of wireless networks and technologies and their management from the perspective of an organization. Wireless LANs, services offered by wireless carriers, analysis and design of wireless networks, wireless security and how organizations can leverage wireless technologies to their advantage.

# 490 Queuing and Stochastic Models in Management Science (3)

Prerequisites: BUAD 301 and ISDS 361B or MATH 335. Probabilistic models in management science; theoretical foundation and model development for Poisson process models, birth-death models, Markovian and general queuing situations and Markov chains; renewal theory and/or reliability models; practical business applications.

#### 495 Internship (1-3)

Prerequisites: BUAD 301; at least junior standing, 2.5 GPA and one semester in residency at the university; and consent of internship adviser. For Information Systems concentration, ISDS 309; for Management Science concentration, ISDS 361B; for International Business concentration, ISDS 309 or ISDS 361B. Planned and supervised work experience. May be repeated for credit up to a total of six units. Credit/No credit grading only.

#### 499 Independent Study (1-3)

Prerequisites: BUAD 301, ISDS 361B, senior standing and approval by the Department Chair. Open to qualified students desiring to pursue directed independent inquiry. May be repeated for credit. Not open to students on academic probation.

#### 513 Statistical Analysis (3)

Prerequisites: MATH 135, ISDS 265 (or equivalents) and classified MCBE status. Basic probability and descriptive statistics; sampling techniques; estimation and hypothesis testing; simple and multiple regression, correlation analysis; computer packages and other optional topics.

#### 514 Decision Models for Business and Economics (3)

Prerequisites: ISDS 513 and classified MCBE status. Linear programming; inventory; PERT-CPM; queuing; computer simulation; time-series forecasting; and other optional topics.

#### 516 Introduction to Logistics Analysis Techniques (3)

Prerequisites: ISDS 514 and classified MCBE status. Scope of logistics; external and internal environment; analysis of demand, analysis of cost, commodity and transportation rates; structure of transport industry, inventory management, merchandise storage and warehousing; framework of regional analysis; methods of location analysis.

#### 518 Quantitative Tools for Information Technology Management (3)

Quantitative tools that are useful in management of an IT organization. Topics include review of probability concepts, linear programming, network modeling, project management, decision analysis, forecasting, queuing theory and simulation. Students may not receive credit for both ISDS 514 and 518.

#### 521 Revenue Management Modeling (3)

Prerequisite: ISDS 514 or equivalent. Corequisite: ECON 515. Revenue management deals with how prices are set in organizations. Analytical tools and a conceptual framework to determine optimal price recommendations. Reinforces concepts student may have learned in other business courses such as marketing or economics.

# 526 Forecasting, Decision Analysis and Experimental Design (3)

Prerequisites: ISDS 514 and classified MCBE status. Time series analysis. Trend, cyclical and seasonal components. Statistical decision theory. Fundamental principles of experimental design; interaction. Software packages.

#### 550 Business Data Communications (3)

Concepts for developing a data communication architecture for a business enterprise. Issues of transmission media, speed, efficiency, protocols, security in a variety of network architectures such as LAN, WAN, VPN, leading to "the state of the art" wireless networks. Concludes with a discussion on the technical implications of doing business on the Internet.

#### 551 Information Resources Management (3)

Prerequisite: admission to MCBE graduate program. Expanding role of information systems in the overall strategy and management of organizations. Topics include strategic value of information systems, management of the information systems development and procurement process, E-commerce and integrated enterprise systems.

### 552 Systems Analysis, Design and Development (3)

Prerequisite: admission to MCBE graduate program. Systems analysis and design concepts, life cycle and prototyping; planning and managing projects; systems evaluation, selection and development. Interface design with controls, object-oriented design concepts and tools, including the use of cases and UML.

#### 553 Electronic Commerce: Analysis and Evaluation (3)

Electronic commerce. Understanding the technical infrastructure that enables E-commerce. Organizational challenge for developing an appropriate business model for emergence of the electronic business. Social economical impact of electronic commerce.

#### 554 E-Commerce: Technological Perspective (3)

Corequisite: ISDS 555. Expanding role of the Internet in the overall strategy, implementation and management of enterprise-wide information systems. Topics include organizational utilization of electronic information resources, as well as Internet application planning, development, implementation and control.

#### 555 Business Databases: Design & Processing (3)

Internet and multi-user databases; accessing Web servers; data warehouse, structured query language, client-server database systems and programming; object-oriented databases.

# 556 Data Warehousing and Foundations of Business Intelligence (3)

Prerequisites: ISDS 552 and 555. Basic concepts, architectures and development strategies of data warehousing, issues in managing data as organizational assets and its potentials for competitive advantages in dynamic business environments.

# 557 Issues in Business Information Systems and Global Telecommunications (3)

Prerequisite: MGMT 515. Advanced concepts of global networks, advanced communications design and management, global information security and privacy, global communications protocol and applications to industry, government and commercial sectors.

# 558 Advanced Software Development with Web Applications (3)

Prerequisites: ISDS 552, 555 and 411 or equivalent programming course. Advanced client/server software development techniques with specific emphasis on the Internet. Topics include file structure, managing relational databases with data control and SQL and ActiveX components and objects.

### 560 Advanced Deterministic Models (3)

Prerequisites: ISDS 514. Advanced linear programming, dynamic programming, integer programming, non-linear programming, business applications. Software packages and computer-utilization.

#### 561 Advanced Probabilistic Models (3)

Prerequisites: ISDS 514 and classified MCBE standing. Stochastic processes, Markov processes, advanced queuing and inventory models; reliability. Software packages and computer utilization.

#### 563 Geographic Information Systems for Business (3)

Prerequisite: ISDS 555. Geographic Information Systems in support of business applications such as site location, scheduling, marketing and real estate. Students will develop GIS applications for local businesses.

#### 565 Wireless Information Systems (3)

Prerequisite: ISDS 550. Contemporary wireless technologies; wide-area and local-area wireless infrastructures; design, planning and operation of wireless communication systems; 3G and next-generation wireless architectures. Wireless spectrum and regulatory issues.

#### 568 Information Systems for Knowledge Management (3)

Knowledge management systems are useful for businesses to leverage their intellectual capital. How knowledge is created, captured, represented, stored and used to solve business problems. Software demonstrations and case studies will be used for illustrations.

#### 576 Business Modeling and Simulation (3)

Prerequisite: ISDS 514. Theory and application of modeling and simulation methodology. Probabilistic concepts in simulation; arrival pattern and service times; simulation languages and programming techniques; analysis of output; business applications. Requires projects. The individual project will fulfill the terminal degree requirement.

#### 577 Seminar in Information Systems Implementation (3)

Prerequisite: to be taken in the last semester or with completion of at least seven ISDS courses in the program. Integrates the development concepts of project management, analysis, design and implementation with telecommunications, database design, programming, testing and system integration issues. Students will develop information systems from concept to completion through individual and team effort. Requires projects. Individual project will fulfill the terminal degree requirement.

#### 578 Seminar in Logistics Models (3)

Prerequisites: ISDS 516, 526 and MKTG 519. Integrates the concepts of logistics to systematically analyze a distribution system. Students will conduct a complete analysis of an existing distribution system to investigate the value added role of logistics in distribution. Includes article analysis, case analysis, a research project, individual and group reports and oral and written presentations. Requires projects. Individual project will fulfill the terminal degree requirement.

#### 597 Project (3)

Prerequisite: classified MCBE status. Directed independent inquiry. Not open to students on academic probation.

#### 599 Independent Graduate Research (1-3)

Prerequisites: classified MCBE status and consent of department chair and associate dean. May be repeated for credit. Not open to students on academic probation.

#### **INTRODUCTION**

The Master of Science in Instructional Design and Technology is an interdisciplinary program housed within the College of Education and draws upon a team of outstanding faculty with expertise, training and experience in instructional technology, design and educational practice with applications for teaching, learning, training and curriculum development. It is a comprehensive, high-quality, affordable program backed up with strong administrative support.

The 21-month program includes 100 percent online coursework and promotes collaboration, professional networking and team-building among peers, faculty, staff and other professionals.

Graduates of the program will gain valuable knowledge and skills in developing, designing, evaluating and implementing a wide variety of instructional technologies applicable to a wide range of training and learning settings (K-12, postsecondary education, military, business/industry). Furthermore, graduates will obtain expertise in the enhancement of teaching and learning based on sound and current educational research, theory and practice, and will be well-positioned as a professional in a competitive job market in educational or business/corporate settings. An active alumni association provides mentoring opportunities while in the program, and professional networking upon completion (www.msidtaa.org).

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

The following goals and learning outcomes have been established for students pursuing a degree in instructional design and technology:

#### Assessment/Evaluation

 Critically discriminate, compare and select appropriate criteria, and effectively implement methodology for developing an effective instructional product

#### Collaboration

 Work productively in team or collaborative settings to achieve common goals or purposes

### **Critical Thinking and Problem Solving**

Critically analyze, evaluate and synthesize information, as well as effectively
generate, select and apply appropriate solutions to solve problems in developing
and implementing the instructional product based on reasoned rationale

### **Media Literacy**

 Compare, discriminate, design, implement and assess various media sources in developing and implementing the instructional product

#### PROGRAM COORDINATOR

JoAnn Carter-Wells

# PROGRAM OFFICE/WEBSITE

College Park 570 657-278-2842 http://msidt.fullerton.edu

### PROGRAM OFFERED

Master of Science in Instructional Design and Technology (online offering only)

#### PROGRAM COUNCIL

Shariq Ahmed (Information Technology)
JoAnn Carter-Wells (Reading)
Cynthia Gautreau (Elementary and
Bilingual Education)
Karen Ivers (Elementary and Bilingual
Education)
Barbara Glaeser (Special Education)
Joyce Lee (Educational Leadership)
Carl Renold (Human Services)
Chris Street (Secondary Education)

#### Research

 Conduct, evaluate, interpret and synthesize research, and apply theoretical ideas to the developing and implementing an instructional product in a practical setting

#### **Written Communication**

 Effectively and critically present ideas in a logical framework in a variety of written forms with proper language structure and mechanics

#### **ADMISSION AND PROGRAM REQUIREMENTS**

New students are admitted once a year for the fall term segment that begins in August. Deadline for completing online applications (www.csumentor.edu) is the first Friday in March, as is the postmark deadline for mailed applications. This deadline may be changed based upon enrollment projections. Please check the program website for current information at http://msidt.fullerton.edu.

Minimum state and program requirements for admission to conditional classified standing in the program include the following:

- Baccalaureate from an accredited institution of higher education
- Minimum grade-point average of 3.0 in the last 60 semester units attempted as documented by two official copies of transcripts from all higher education institutions attended
- Good standing at the last college attended
- For international students from countries where English is not the official language, a TOEFL score of 575
- Submission of a written self-assessment essay. Students must submit a written essay on issues such as why they would be good candidates for the program, including their experience in online learning environments and curriculum development or training; time management skills, their level and types of technology skills, their technology access, ability to work independently and professional goals
- Successfully pass a phone or face-to-face interview designed to assess their level of technology knowledge, skills, abilities to be an online learner and professional goals
- Technology requirements may be found on the program website, http://msidt.fullerton.edu
- Complete of a readiness for online learning assessment tool
- Continuation and completion of the program requires registration, attendance and successful completion of the on-campus
   "Boot-Up Camp" and the Midpoint Symposium (program requisites)

If circumstances force a student to fall out of their original cohort schedule, they will be permitted to continue in the program, but will default to the next cohort cycle provided they remain in good academic standing.

#### **STUDY PLAN**

The Master of Science in Instructional Design and Technology requires 30 units of approved graduate courses and takes a total of five term segments, (21 months) to complete. The schedule runs year-round as follows:

#### August

On-Campus Boot-Up Camp (1 day/Saturday)

Session 1 – September through December

IDT 505 Hardware and Authoring Environments in Instructional Contexts (3)

IDT 510 Research Practices in Instructional Design and Technology (3)

Session 2 – January through early May

IDT 520 Instructional Design Issues for Technology-based Instruction (3)

IDT 525 Instructional Approaches in Learning and Cognition (3)

Session 3 - May through August

IDT 530 Planning, Designing and Evaluating Technology-based Instruction (3)

IDT 535 Instructional Strategies for Pre-K through Adulthood (3)

#### October

On-Campus Midpoint Symposium (1 day/Saturday)

Session 4 - September through December

IDT 540 Web-based Teaching and Learning (3)

IDT 545 Emerging Technology and Issues in Instruction (3)

Session 5 – January through early May

IDT 550 Practicum in Instructional Design and Technology (3)

IDT 597 Project (3)

# INSTRUCTIONAL DESIGN AND TECHNOLOGY COURSES

Courses are designated as IDT in the class schedule.

# 505 Hardware and Authoring Environments in Instructional Contexts (3)

Prerequisite: successful completion of summer on-campus orientation (Boot-Up Camp). Necessary understanding of operating systems, hardware and networking environments to develop instructional tools and products using a multimedia authoring tool.

# 510 Research Practices in Instructional Design and Technology (3)

Prerequisite: completion of orientation program for M.S. in Instructional Design and Technology (IDT). Survey course on terms and accepted procedures in qualitative and quantitative inquiry as they apply to instructional design and technology. Students conduct controlled portions of IDT research and prepare preliminary proposals for larger projects.

#### 520 Instructional Design Issues for Technology-based Instruction (3)

Prerequisite: IDT 505. Systematic design of instructional courseware, including analysis, media selection, design, development and evaluation. Topics include learning principles, learner characteristics, instructional strategies, screen design, response analysis, feedback and interactivity.

#### 525 Instructional Approaches in Learning and Cognition (3)

Prerequisites: IDT 510 and concurrent enrollment in IDT 520. Behavioral, cognitive, constructivist learning theories, related concepts and their implications for designing instruction. Develops critical thinking about desirable cognitive outcomes when designing educational experiences.

# 530 Planning, Designing, Developing and Evaluating Technology-based Instruction (3)

Prerequisite: IDT 520. Application of computer-based instructional design principles to develop new methods and materials for technology-based instruction. Topics include computer-based instruction, project management, planning, assessment, design principles and development tools. Students will design multimedia courseware.

#### 535 Instructional Strategies for Pre-K through Adulthood (3)

Prerequisites: IDT 525 and concurrent enrollment in IDT 530. Instructional strategies for Pre-K through adulthood. Emphasizes current research on instructional strategies and assistive technologies in a variety of instructional contexts.

### 540 Web-based Teaching and Learning (3)

Prerequisites: IDT 530 and successful completion of Midpoint Symposium. Design, development and implementation of Web pages and sites for instructional purposes. Issues surrounding using the World Wide Web for instruction.

# 545 Emerging Technologies and Issues in Instruction (3)

Prerequisites: IDT 530, IDT 535 and concurrent enrollment in IDT 540. Theoretical basis, issues and strategies for improving teaching and learning through the use of emerging technologies.

#### 550 Practicum in Instructional Design and Technology (3)

Prerequisites: concurrent enrollment in IDT 597 and consent of Program Coordinator. Strategies for effectively implementing and evaluating instructional design and technology to improve learning; includes significant field work assignments in work-related settings.

### 597 Project (3)

Prerequisites: concurrent enrollment in IDT 550 and consent of Program Coordinator. Individual research on an empirical project, with conferences with the instructor, culminating in a project.

#### INTRODUCTION

The international business curriculum covers the fundamentals of business administration, with an emphasis on international business. Foreign language courses are required and stress the use of the applied language. This curriculum prepares students for entry level positions. Opportunities exist in contracts, distribution and sales and may lead to general management positions. Since Southern California is a major international business center, there are career opportunities with internationally oriented firms in this area. Other career opportunities may involve international travel or overseas assignments.

Language concentrations are offered in Chinese, French, German, Japanese, Portuguese and Spanish. Other concentrations may be developed in the future. The program is offered jointly by the Mihaylo College of Business Administration and Economics and the Department of Modern Languages and Literatures.

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

The following goals and learning outcomes have been established for students pursuing a degree in International Business:

#### **Problem Solving and Critical Thinking Skills**

Each student will use the following skills in a business situation

- Quantitative/analytical reasoning
- Problem solving
- Critical thinking

### **People Skills**

Each student will work effectively with others in a business situation, demonstrating knowledge and/skills in

- Working with and through others
- Working in teams
- Leadership theories and models

### **Ethical Awareness**

• Interpret ethical issues and responsibilities in a business organization

# **Functional Knowledge**

Each student will understand and apply

- The principles and roles of international economics, finance and marketing
- The interrelationships of these disciplines within a strategic framework

# PROGRAM COORDINATOR

Irene Lange

# PROGRAM OFFICE/WEBSITE

Steven G. Mihaylo Hall 5214 657-278-2223

http://business.fullerton.edu/ Undergraduate/intlbus.htm

### **PROGRAM OFFERED**

Bachelor of Arts in International Business

Concentrations:

Chinese

French

German

Japanese

Portuguese

Spanish

### Information Technology Skills

To support business analysis and operations each student will

- Have a working knowledge of information technology
- Demonstrate information technology skills

### Economic and legal environment knowledge

 Understand the economic and legal environments in which business operates

#### **Communication Skills**

 Demonstrate the knowledge and skills needed to effectively communicate about business issues in both the written and oral form

#### **Multi-cultural Awareness**

Each student will become familiar with

- The cultural context of business
- The major industries and services in the countries using their target language

#### **Global Awareness**

Each student will interpret the impact of global issues on business organizations, including

- The theory, practice and institutions of the international economy
- Theories of international trade and the role of marketing decisions across national boundaries and markets
- Financing challenges of the multinational business

# Foreign Language Competency

To provide students with the capability of dealing directly with business persons in the country of their designated language, students will develop

- Foreign Language Professional Vocabulary
- Foreign Language Knowledge and Abilities

# BACHELOR OF ARTS IN INTERNATIONAL BUSINESS (120 UNITS)

Admission to the International Business major involves two steps. Students who apply to the major are initially classified as pre-international business. After completing the lower-division core requirements with grades of at least "C" (2.0) and demonstrating satisfactory progress toward intermediate competency in a foreign language, students may apply to the international business major. Pre-international business students may take lower-division business courses, but most upper-division courses are not open to pre-international business students. Students must attain a 2.0 ("C") grade-point average or better in all university and concentration courses.

All courses in the major must be passed with a "C" (2.0) or better.

### Lower-Division Core Courses (24 units)

ACCT 201A Financial Accounting (3)

ACCT 201B Managerial Accounting (3)

BUAD 201 Business Writing (3)

ECON 201 Principles of Microeconomics (3)

ECON 202 Principles of Macroeconomics (3)

MGMT 246 Business and Its Legal Environment (3)

ISDS 265 Introduction to Information Systems and Applications (3)

MATH 135 Business Calculus (3)

OR MATH 130A Short Course in Calculus (4)

OR MATH 150A Analytic Geometry and Calculus (4)

Intermediate foreign language competency is a prerequisite to the concentrations in Chinese, French, German, Japanese, Portuguese and Spanish. Students in international business should consult an adviser in the Department of Modern Languages and Literatures as soon as possible in order to assess individual proficiency levels. Students may be required to take additional prerequisite courses.

#### **Upper-Division Core Courses (33 units)**

BUAD 301 Advanced Business Communication (3)

ECON 335 International Economy (3)

FIN 320 Business Finance (3)

FIN 370 International Business Finance (3)

ISDS 361A Quantitative Business Analysis: Probability and Statistics (3)

ISDS 361B Quantitative Business Analysis: Statistics and Management Science (3)

MGMT 339 Principles of Management and Operations (3)

MGMT 340 Organizational Behavior (3)

MGMT 350 International Business and Management (3)

MKTG 351 Principles of Marketing (3)

MKTG 445 International Marketing Strategies (3)

### Global Business Collateral Course (3 units)

Students must take an approved study-abroad course or one of the following:

ECON 330, 331, 332, 333, 334, 336

FIN 371, 373

MKTG 475

### Capstone Core Course (3 units)

MGMT 480 Global Strategic Management (3)

#### Concentration (15 units)

Choose one of the following concentrations listed below.

#### Concentration in Chinese

CHIN 310 Chinese in the Business World (3)

CHIN 311 Chinese for International Business (3)

CHIN 315 Introduction to Chinese Civilization (3)

CHIN 325 Contemporary Chinese Culture (3)

MLNG 495 Internship in Foreign Languages (3)

#### Concentration in French

FREN 310 French in the Business World (3)

FREN 311 French for International Business (3)

FREN 315 Origins of Modern France (3)

FREN 325 Contemporary French Civilization (3)

MLNG 495 Internship in Foreign Languages (3)

#### Concentration in German

GRMN 310 German in the Business World (3)

GRMN 311 German for International Business (3)

GRMN 315 Introduction to German Civilization (3)

GRMN 325 Current Trends in Culture of German-Speaking Peoples (3)

MLNG 495 Internship in Foreign Languages (3)

### Concentration in Japanese

JAPN 310 Japanese for Business (3)

JAPN 311 Japanese for International Business (3)

JAPN 315 Introduction to Japanese Civilization (3)

JAPN 316 Modern Japan (3)

MLNG 495 Internship in Foreign Languages (3)

### Concentration in Portuguese

PORT 310 Portuguese in the Business World (3)

PORT 317 Advanced Conversation and Composition (3)

PORT 320 Introduction to Luso-Brazilian Culture and Civilization (3)

PORT 325 Contemporary Brazilian Civilization (3)

One of the following may be substituted for PORT 320 or 325:

SPAN 310, 311

MLNG 495 Internship in Foreign Languages (3)

### Concentration in Spanish

SPAN 310 Spanish in the Business World (3)

SPAN 311 Spanish for International Business (3)

SPAN 315 Introduction to Spanish Civilization (3)

SPAN 316 Introduction to Spanish-American Civilization (3)

One of the following may be substituted for SPAN 315 or 316:

SPAN 415, 416

MLNG 495 Internship in Foreign Languages (3)

### **Other Requirements**

Students must take all required core and concentration courses for a letter grade. The credit/no credit grading option may not be used for these courses, and a grade of CR (credit) will not satisfy the requirements of the degree. Exceptions: MATH 130, 135 or 150A and Internship may be taken for the credit/no credit option, although courses taken to meet general education requirements must be taken for a letter grade. At least 12 units of upper-division core courses, 6 units of upper-division concentration courses and 6 units of internships must be taken in residence at CSUF.

#### INTRODUCTION

The Department of Kinesiology advances the understanding and practice of human movement across the lifespan in the context of a diverse and changing society.

The Bachelor and Master of Science degrees in Kinesiology offer students a variety of professional focus areas, including Clinical Exercise Science, Fitness and Health Promotion, Gerokinesiology, Sport Studies, Teacher Education and Pedagogical Studies (MS only). An undergraduate Minor in Kinesiology is also available. The Bachelor of Science Degree in Athletic Training meets the requirements of the Commission on the Accreditation of Athletic Training Education. Completing the B.S. in Athletic Training as part of the Athletic Training Education Program prepares students to take the national board examination to become certified athletic trainers (ATC).

Degrees in Kinesiology offer advanced study and research opportunities in one or more of the sub-disciplines of Kinesiology: Biomechanics, Exercise Physiology, Motor Control/Learning, Sport and Exercise Psychology, Socio-cultural Perspectives and Philosophical Perspectives.

The intra-disciplinary focus of the Department's curriculum fosters the development of diverse values and skills important to a liberal arts education: critical thinking, problem solving, leadership, verbal and written communication, and technological competency.

The Department provides general education courses and university-wide opportunities for developing skills and knowledge leading to lifelong enjoyment of physical activity, health and well-being. Internships, independent study and scholarly outreach provide opportunities for collaboration with and service to the community.

#### **LEARNING GOALS AND STUDENT LEARNING OUTCOMES**

The following goals and learning outcomes have been established for students pursuing a degree in Kinesiology:

#### Knowledge and skill in a variety of sport and fitness activities

 Demonstrates knowledge and skill in fitness, aquatics, combative, team sports, individual sports and court and racquet sports

# Natural and Social Scientific foundations of human movement across the lifespan and across diverse populations

- Demonstrates understanding of the scientific method and other systematic ways of knowing human movement
- Demonstrates understanding of the biological and physical bases of human movement
- Demonstrates how motor skills are acquired and refined
- Demonstrates understanding of how various fitness parameters are achieved and maintained
- Demonstrates understanding of the behavioral and psychological bases of human movement

#### **DEPARTMENT CHAIR**

Stephan Walk

#### **DEPARTMENT OFFICE/WEBSITE**

KHS 121A 657-278-3316 http://hhd.fullerton.edu/knes

### **PROGRAMS OFFERED**

Bachelor of Science in Athletic Training
Bachelor of Science in Kinesiology
Minor in Kinesiology
Subject Matter Preparation Program
in Physical Education for the Single
Subject Credential
Master of Science in Kinesiology

#### **FACULTY**

Michele Barr, Joao Barros, William Beam, Andrea Becker, Lee Brown, David Chen, Jared Coburn, Andy Galpin, John Gleaves, Barbie Gil-Alviso, Daniel Judelson, Robert Kersey, Patricia Laguna, Matthew Llewellyn, Scott Lynn, Julie Max, Guillermo Noffal, Debra Patterson, Debra Rose, Daniela Rubin, Clay Sherman, Traci Statler, Kavin Tsang, Stephan Walk, Kathy Webster, Lenny Wiersma, Kathleen Wilson  Demonstrates understanding of the social structural, demographic, and economic context of programs and policy related to human movement

# Perspectives from the humanities to understand key elements of human movement

- Demonstrates understanding of the socio-cultural perspectives of human movement
- Demonstrates understanding of the historical perspectives of human movement
- Demonstrates understanding of philosophical perspectives of human movement

#### Human movement in health, wellness, and quality of life

 Demonstrates understanding of the relationships among and contributions of human movement skill, conditioning and training to personal well being

# Leadership, technological competency, and content expertise in an applied setting

- Applies knowledge from the sub-disciplines of kinesiology to enhance motor skill and fitness in a variety of populations and conditions
- Demonstrates knowledge of the conditions of safe practice in movement contexts, and responds appropriately to common injuries occurring during physical activity
- Uses and applies measurement instruments and principles for qualitative and quantitative assessment of human performance
- Demonstrates ability to integrate intra-disciplinary knowledge bases of kinesiology in an applied, problem-solving context
- Demonstrates leadership skills and the ability to work collaboratively on professionally-related activities

# Information Literacy, Effective communication skills and professionalism in an applied setting

- Applies critical thinking, writing, reading, oral communication, quantitative and qualitative analysis and information management skills to movement-related questions
- Uses information technology to support inquiry and professional practice in movement-related fields
- Is prepared to engage in informed dialogue with professional and lay populations within local and global communities

# In-depth knowledge and skills needed for advanced study and/or preparation in an area of specialization

• Per applicable certification, credential or other guidelines

# BACHELOR OF SCIENCE IN ATHLETIC TRAINING (123 UNITS)

The Department of Kinesiology offers a Bachelor of Science in Athletic Training through its Athletic Training Education Program (ATEP), which is nationally accredited by the Commission on the Accreditation of Athletic Training Education (CAATE). Upon successful completion, students earn a B.S. in Athletic Training and are eligible to take the Board of Certification (BOC) exam to become a certified athletic trainer (ATC). Please refer to the program website (http://hhd.fullerton.edu/at/) for the most current ATEP information.

The ATEP is an arduous, pre-professional experience for future certified athletic trainers. The Athletic Training (AT) major includes five semesters of clinical rotations. Competence will be gained in each of the 12 athletic training domains as outlined by the National Athletic Trainers' Association.

#### **ADMISSIONS POLICIES AND PROCEDURES**

CSUF admission does not guarantee admission into the AT major. Competitive admission includes the applicant's academic history, athletic training experiences, professional recommendations and communication skills. The AT Selection Committee includes AT-related faculty, staff and students. Minimal academic, clinical, professional and technical standards are required to enter and remain in the ATEP. Ongoing assessments determine appropriateness for dismissal, probation, retention or completion. Applicants MUST have a minimum overall college GPA of 2.5. Once admitted to the ATEP, the student's major will be changed to AT.

### **Application Packet**

ATEP application packets are available online (http://hhd. fullerton.edu/at/). A completed application and required support materials must be submitted to the ATEP director by the stated deadline (see website).

### **Course Prerequisites**

Applicants must pass ("C" or better) these courses or their equivalent prior to entering the Athletic Training major:

PSCY 101 Introductory Psychology (3)

HESC 101 Personal Health (3)

KNES 200 Introduction to Athletic Training (3)

BIOL 361 Human Anatomy (4)

OR KNES 191A Int. Human Anatomy and Physiology (4)

#### **Clinical Prerequisites**

All ATEP applicants must complete and document 100 hours of clinical experience under the supervision of a Certified Athletic Trainer.

### **Support Materials**

Applicants must submit the following:

- Three Recommendation Forms (ATEP Application Packet) from individuals knowledgeable about the applicant's ability to succeed in the ATEP (athletic trainers, physicians, coaches, professors, etc.)
- Personal Statement (<500 words). This document should briefly detail the candidate's reasons for pursuing athletic training, previous experiences, expectations of the ATEP and future professional goals
- Transcripts of all college credits
- Proof of current Professional Rescuer CPR

#### **ATEP STANDARDS**

AT students must achieve and maintain Academic, Professional, Clinical and Technical standards. Failure to comply may result in probation or dismissal. Once admitted, all students shall meet or exceed the following ATEP Standards:

#### **Academic Standards**

Minimally achieve and maintain:

- Fulltime CSUF student status
- 2.5 overall GPA
- 3.0 Athletic Training Core GPA (no grade below "C")
- 2.5 Athletic Training Foundation GPA
- 2.0 individual semester GPA

#### **Clinical Standards**

Minimally demonstrate:

- Compliance with the clinical site policies and procedures
- Effective and efficient time management skills
- Complete 200-300 clinically supervised hours per semester
- Complete and/or comply with:
  - ATEP First Responder Policy
  - ATEP Student Health Screening
  - ATEP Clinical Practice Policy
  - ATEP Communicable Disease Policy

#### **Professional Standards**

Minimally achieve and maintain:

- A valid Professional Rescuer CPR Certification
- A positive and professional attitude
- Patient confidentiality
- Positive leadership
- Professional communication
- Professional appearance
- Respect for the property and rights of all others
- NATA membership

#### **Technical Standards**

Achieve and maintain ATEP Technical Standards as described in the ATEP Handbook and the website (http://hhd.fullerton.edu/at/).

#### Additional

All AT students must clearly understand the following:

- Successful completion of the B.S. in Athletic Training does
   NOT guarantee certification as a Certified Athletic Trainer
- To take the BOC exam as a CSUF graduate, one must successfully complete the AT major as described. CSUF will not sponsor any graduate who does not meet ALL ATEP Standards.
- Failure to meet any of these standards may result in probation or dismissal from the California State University, Fullerton – Athletic Training major

#### TRANSFER STUDENTS

Transfer students must meet the same admissions requirements as other students, and should enter CSUF as a Kinesiology major. Upon ATEP admission, individuals will then change their major to Athletic Training.

#### **ATEP COSTS**

ATEP students provide their own transportation (and any costs incurred) to and from clinical sites. Some clothing requirements will also be the responsibility of the student. The ATEP will provide liability insurance, medical kits and supplies, and most specialized clothing. Clinical courses require students to be a member of the National Athletic Trainers Association at a cost of approximately \$100 per year.

#### **REQUIREMENTS FOR THE MAJOR**

Athletic Training Foundation (31-32 units)

KNES 191B Integrated Human Anatomy and Physiology (4) OR BIOL 310 Human Physiology (3)

ENGL 301 Advanced College Writing (3)

KNES 260 Movement Anatomy (3)

KNES 300 Principles of Human Movement (3)

KNES 348 Physiology of Exercise (3)

KNES 348L Physiology of Exercise Lab (1)

KNES 349 Measurements & Statistics in Kinesiology and Health (3)

KNES 350 Nutrition (3)

KNES 351 Principles of Strength and Conditioning (3)

KNES 371 Human Motor Control and Learning (3)

KNES 383 Psychology of Sport and Physical Activity (3)

### **Athletic Training Core (40 units)**

KNES 200 Introduction to Athletic Training and Sports Medicine (3)

KNES 365 Prevention & Care of Athletic Injuries (3)

KNES 367 Clinical Proficiencies in Athletic Training I (2)

KNES 368 Clinical Proficiencies in Athletic Training II (2)

KNES 369 Clinical Proficiencies in Athletic Training III (2)

KNES 373 Advanced Injury Assessment-Lower Extremity (3)

KNES 374 Advanced Injury Assessment-Upper Extremity (3)

KNES 375 Management of Athletic/Exercise Emergencies (3)

KNES 377 Therapeutic Exercise in Rehabilitation (3)

KNES 378 Therapeutic Modalities in Rehabilitation (3)

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KNES 451 Sports Medicine (3)

KNES 463 Biomechanics of Musculoskeletal Injury (3)

KNES 465 Administration & Leadership in Athletic Training (3)

KNES 468 Clinical Proficiencies in Athletic Training IV (2)

KNES 469 Clinical Proficiencies in Athletic Training V (2)

# BACHELOR OF SCIENCE IN KINESIOLOGY (120 UNITS)

The B.S. in Kinesiology requires 51 units in the major, including nine units of foundation courses, 18-unit disciplinary core, three-unit writing course and 21-unit advising track in one of the following focus areas: Athletic Training, Clinical Exercise Science, Fitness and Health Promotion, Gerokinesiology, Sport Studies or Teacher Education. With adviser approval, students also have the option of developing a "Special Studies" advising track if their interests lie outside these designated areas. The Special Studies plan must include a rationale statement, 21 units of upper-division coursework, and must be approved by a faculty adviser and the Department Chair. Students are required to seek advising from Department faculty in planning careers, selecting advising tracks and choosing elective courses.

All courses toward the major, including prerequisites, must be completed with a "C" (2.0) or better, and must be taken on an Option 1 (letter grade) basis.

#### **Prerequisite Requirements**

Prerequisite requirements for the major include three units of anatomy/physiology (BIOL/KNES 210 or equivalent) and six units of performance classes, representing the following performance areas: Fitness, Martial Arts/Combatives, Aquatics, Individual Sports, Racquet Sports, and Team Sports. Four of the six performance courses must be completed prior to enrollment in KNES 300. All performance courses must be completed prior to completing Disciplinary Core Courses.

# Prerequisite Performance Courses (6 units)

Fitness

KNES 100, 102A, 103, 106A, 143, 144, 145, 146

Aquatics

KNES 110A, 110B, 111\*, 112A\*, 112B\*, 214A\*, 214B\*

Martial Arts/Combatives

KNES 145\*, 150, 151A, 151B, 152A, 153, 154, 155\*, 156\*

Individual Sports

KNES 112A\*, 112B\*, 114A, 117A, 117B, 119A, 119B, 119C, 120A, 120B, 120C, 155\*, 156\*, 214A\*, 214B\*, 246A, 246B

Racquet Sports

KNES 130A, 130B, 131A, 131B, 131C, 131D, 132A, 132B

Team Sports

KNES 111\*, 160, 161A, 161B, 164A, 164B, 164C, 165A, 165B, 167A, 167B, 167C

#### **REQUIREMENTS FOR THE MAJOR**

### **Foundation Courses (9 units)**

KNES 202 Introduction to Kinesiology (3)

KNES 260 Movement Anatomy (3)

KNES 349 Measurement and Statistics in Kinesiology (3)

### **Disciplinary Core Courses (18 units)**

KNES 300 Principles of Human Movement (3)

KNES 348 Physiology of Exercise (3)

KNES 371 Human Motor Control and Learning (3)

KNES 380 History and Philosophy of Human Movement (3)

KNES 381 Sports, Games and Culture (3)

KNES 383 Psychology of Sport and Physical Activity (3)

#### **Upper-Division Writing Course (3 units)**

ENGL 301 Advanced College Writing (3)

#### **Advising Track Requirement (21 units)**

Courses are to be selected from one of the following advising track focus areas: Athletic Training, Clinical Exercise Science, Fitness and Health Promotion, Gerokinesiology, Sport Studies, Teacher Education or Special Studies. See descriptions and specific course requirements below. With adviser approval, these courses can be modified to better meet student needs/interests.

# CLINICAL EXERCISE SCIENCE ADVISING TRACK (21 UNITS)

Students taking coursework in preparation for admission to a specific professional program, such as physical or occupational therapy, should check the entry requirements for the specific program at the institution to which they intend to apply. These students should also seek advising from the Health Professions Office in UH-223. Through careful planning students can maximize the number of courses that meet CSUF General Education and Kinesiology degree requirements, as well as the entry requirements for other programs of interest.

<sup>\*</sup> May only be used in one performance area.

### **Advising Track Recommendations (12 units)**

KNES 377 Therapeutic Exercise (3)

KNES 451 Sports Medicine (3)

KNES 461 Biomechanics (3)

KNES 495 Internship (3)

#### **Advising Track Electives (9 units)**

KNES 351, 354, 364, 365, 373, 374, 375, 378, 432, 453, 454, 455, 457, 463, 471, HESC 401, 405

# FITNESS AND HEALTH PROMOTION ADVISING TRACK (21 UNITS)

#### **Advising Track Recommendations (12 units)**

KNES 350 Nutrition (3)

KNES 351 Principles of Strength and Conditioning (3)

KNES 354 Cardiovascular Exercise Testing and Prescription (3) OR KNES 352 Principles of Teaching Group Fitness (3)

KNES 495 Internship in Kinesiology (3)

#### **Advising Track Electives (9 units)**

KNES 342, 348L, 352, 354, 406, 432, 451, 453, 454, 455, 457; HESC 400, 405, 440, 460, 461

#### **GEROKINESIOLOGY ADVISING TRACK (21 UNITS)**

#### **Advising Track Recommendations (12 units)**

KNES 352 Principles of Teaching Group Fitness (3)

KNES 454 Physical Dimensions of Aging (3)

KNES 455 Functional Perform Assess Program for Older Adults (3)

KNES 495 Internship in Kinesiology (3)

### **Advising Track Electives (9 units)**

KNES 342, 350, 351, 352, 354, 364, 375, 377, 378, 432, 451, 457, 463, 471

HESC 440, 450

PSYC 362

#### **SPORT STUDIES ADVISING TRACK (21 UNITS)**

#### **Advising Track Recommendations (12 units)**

KNES 325 Techniques of Coaching (3)

KNES 351 Principles of Strength and Conditioning (3)

KNES 365 Prevention/Care of Athletic Injuries (3)

KNES 385 Instructional Analysis of Human Movement (3)

# **Advising Track Electives (9 units)**

KNES 350, 384, 386, 387, 410, 414, 430, 432, 461, 463, 480, 495

### **TEACHER EDUCATION ADVISING TRACK (21 UNITS)**

Students completing the coursework below meet only some of the requirements for the Subject Matter Preparation Program in Physical Education (SMPP-PE) which is designed to prepare students to enter a Single Subject Credential Program in Physical Education. Specifically, students completing this advisement track must complete additional units to fulfill California state-mandated subject matter competencies for pursuit of the single-subject teaching credential. Students interested in the SMPP-PE should see the program description below.

#### Advising Track Requirements: (21 units)

KNES 242 Teaching Lifetime Physical Activity (3)

KNES 325 Techniques of Coaching (3)

KNES 363 Developmental Adaptations of the Atypical (3)

KNES 364 Motor Development (3)

KNES 385 Instructional Analysis of Human Movement (3)

KNES 386 Movement and the Child (3)

KNES 387 Movement and the Adolescent (3)

In addition to the 51-unit requirement for the Kinesiology degree and the Teacher Education advising track, students who wish to fulfill California state-mandated subject matter competencies (i.e., the Subject Matter Preparation Program) for pursuit of the single-subject teaching credential in physical education must also complete the requirements described below.

# SUBJECT MATTER PREPARATION PROGRAM (FOR OBTAINING SINGLE SUBJECT TEACHING CREDENTIAL IN PHYSICAL EDUCATION)

The Kinesiology Department offers coursework as part of the Subject Matter Preparation Program in Physical Education (SMPP-PE) for obtaining a Single Subject Credential (K-12) in Physical Education. In place of the six-unit performance course requirements within the major, students in the teacher education advising track must take KNES 240 and KNES 241, in addition to one unit in the Martial Arts/Combatives category and one unit from the racquet Sports category required by the Kinesiology Major. In addition to the requirements for a major in Kinesiology (which includes the Teacher Education advising track described above), all credential candidates must complete the following courses with a minimum grade of "C" (2.0). A grade-point average of 3.0 in the major and 2.75 cumulative is highly recommended for admission to the fifthyear teacher education program.

# Additional Requirements: Subject Matter Preparation Program in Physical Education (21 units)

EDSC 304 Personal Proficiency in Educational Technology for Secondary Teachers (3)

EDSC 310 The Teaching Experience: Participation (3)

EDSC 320 Adolescence and Education (3)

(May count as a General Education Category IV)

EDSC 330 Developing Literacy in Secondary Schools (3)

EDSC 340 Diversity in Secondary Schools (3)

KNES 120 Gymnastics (1)

KNES 494 Practicum (2)

DANC 101 Introduction to Dance (3)

Current CPR/First Aid Certificate

### **Advisement**

The department offers guidance for students considering a teaching career. Prospective students should consult with the Teacher Education Coordinator as early as possible in order to plan and acquire needed experiences prior to entry into the Teacher Education Program. The university program for meeting basic requirements for the teaching credential with a specialization in Physical Education can be found elsewhere in this catalogue (see Teaching Credential Programs).

#### **Admission to Teacher Education**

In addition to the requirements set forth in the Teaching Credential Programs and in the Department of Secondary Education, the Department of Kinesiology requires candidates to complete the SMPP-PE and submit an application. A screening committee evaluates candidates' qualifications based on Kinesiology GPA, cumulative GPA, required SMPP-PE coursework, experiences with children and adolescents, and having passed the California Basic Education Skills Test (CBEST). In addition, the candidate must be available for a personal interview by the Kinesiology Teacher Education Committee. Applications to the Teacher Education Program must be submitted by Feb. 28 each year.

Acceptance into the program allows the candidate to enroll in the following Fall-Spring semester sequence:

Fall semester (15 units)

EDSC 410, 440S, 440F

KNES 442, 449E

Spring semester (16 units)

EDSC 460

KNES 449I, 449S

#### **MINOR IN KINESIOLOGY (24 UNITS)**

All courses for the minor must be taken for a letter grade and completed with "C" (2.0) or better. Students are required to meet with the Kinesiology General Adviser for assistance in developing a cohesive set of courses that would best support their educational, career, or personal goals.

#### Performance Courses (3 units)

Three courses (1 unit each) must be taken from any three of the following areas: Fitness, Martial Arts/Combatives, Aquatics, Individual Sports, Team Sports, or Racquet Sports.

#### Required Courses (9 units)

KNES 202 Introduction to Kinesiology (3)

KNES 210 Human Anatomy and Physiology (3)

KNES 260 Movement Anatomy (3)

#### **Upper-Division Electives (12 units)**

KNES 300, 325, 348, 351, 353, 371, 380, 381, 383, 386, 387

#### **MASTER OF SCIENCE IN KINESIOLOGY (30 UNITS)**

At least 18 of the 30 units toward the graduate degree in Kinesiology must be 500 level. Once accepted into the program, each student must create an adviser-approved study plan before completing nine units of work. With adviser approval, up to nine units of 400/500-level coursework may be included on the study plan that was taken at another university or in another department at Cal State Fullerton.

#### **Admission Requirements**

All graduate degree applicants must meet the university requirements for admission, which include a baccalaureate degree from an accredited institution with a grade-point average of at least 2.5 in the last 60 semester units attempted. To be admitted into the graduate program in Kinesiology, students must further submit to the Kinesiology graduate program: (1) transcripts showing completion of an undergraduate degree in Kinesiology (or equivalent field) with a grade-point average of at least 3.2 in upper-division major coursework; (2) Graduate Record Exam general test results with recommended minimum scores of 450 for the Verbal, 450 for the Quantitative and 3.5 for Analytical Writing; (3) a 500-word essay describing the applicant's academic/professional interests, which also identifies a specific Advising Track(s) of interest and, where possible, specific faculty with whom they wish to work; and (4) two letters of recommendation, preferably from former faculty who can address their academic ability and potential for success in graduate school.

Students who meet the general university requirements, but do not meet the Kinesiology degree requirements, may apply to the university for postbaccalaureate-unclassified standing. Any student without an undergraduate degree in Kinesiology, Exercise Science, Physical Education, or a related field must complete a prescribed set of undergraduate coursework (usually about 12 units) with a gradepoint average of at least 3.0. Any student with a grade-point average deficiency must complete additional undergraduate coursework as specified by the Kinesiology graduate program adviser. Once all admission requirements are subsequently met, a change of program may be requested from postbaccalaureate-unclassified standing to conditionally classified in Kinesiology.

#### **Classified Standing**

Classified standing requires the development of a study plan (see below) approved by the faculty adviser, graduate studies committee, kinesiology graduate program adviser, and office of graduate studies. No more than nine units of graduate work taken before classification may be included on the study plan. Any changes to the study plan after classified standing is granted must be approved in advance, in writing, by the Kinesiology graduate program.

#### **Advancement to Candidacy**

Advancement to candidacy is attained by requesting a graduation check in the semester prior to graduation (see class schedule for deadlines) and receiving subsequent approval from the graduate studies adviser on the grad check completion review form, mailed by the Graduate Studies Office. Students not completing requirements by the graduation date specified on the original graduation check must contact the Graduate Studies Office.

#### **GRADUATE STUDY PLAN (30 UNITS)**

The study plan must include KNES 508 and KNES 510 (which fulfills the graduate level writing requirement), and at least two advanced study courses, one in the student's major academic area of interest and one in a minor or supporting academic area. The study plan also must include 15 units of electives selected from one of six advising tracks: clinical exercise science, fitness and health promotion, gerokinesiology, pedagogical studies, performance enhancement/sport psychology/sport studies, or special studies. Finally, the study plan must include one of three culminating experience options: a thesis, a project, or a comprehensive examination.

# Core Course Requirements (9 units)

KNES 508 Statistical Methods in Kinesiology (3) KNES 510 Research in Kinesiology (3)

KNES 597/598 Project/Thesis (3) or Comprehensive Examination\*

#### Advising Track Requirements (21 units)

The remaining 21 units of coursework are to be selected from one of the following six advisement tracks: Clinical Exercise Science; Fitness and Health Promotion; Gerokinesiology; Teacher Education/Pedagogical Studies; Sport Studies; Special Studies. Advanced study courses are required within each track, as well as recommended electives.

#### **KINESIOLOGY COURSES**

Courses are designated as KNES in the class schedule.

Students may sign up for only one section of a given performance activity in any semester. This applies to KNES 100 through 167, 214A, 214B, and 246A. Thus a student may take KNES 102A Beginning Jogging and KNES 112B Intermediate Surfing since jogging and surfing are different activities; however, signing up for multiple tennis courses, for example, is not permitted.

#### 100 - 167 Performance Courses (1)

100 Physical Conditioning; 102A Beginning Jogging; 102B Intermediate Jogging (1); 103 Fitness Walking; 106A Cardio Spinning (1); 110A Beginning Swimming; 110B Intermediate Swimming; 110C Advanced Swimming; 111 Water Polo; 112A Beginning Surfing; 112B Intermediate Surfing; 114A Beginning Rock Climbing (1); 117A Beginning Bowling; 117B Intermediate Bowling; 119A Beginning Golf; 119B Intermediate Golf; 119C Advanced Golf; 120A Beginning Gymnastics; 120B Intermediate Gymnastics; 120C Advanced Gymnastics; 130A Beginning Badminton; 130B Intermediate Badminton; 131A Beginning Tennis; 131B Advanced-Beginning Tennis; 131C Intermediate Tennis; 131D Advanced Tennis; 132A Beginning Racquetball; 132B Intermediate Racquetball; 143 Dance Aerobics (1); 144 Aerobic Exercise and Weight Control; 145 Cardio Kick-Boxing; 146 Weight Training; 150 Beginning Wrestling; 151A Beginning Aikido; 152A Beginning Karate; 153 Wushu: Chinese Martial Arts; 154 Self Defense; 155A Beginning Fencing; 156 Tai Chi; 160 Ultimate Frisbee; 161 Slow Pitch Softball; 161B Intermediate Slow Pitch Softball; 164A Beginning Volleyball; 164B Intermediate Volleyball; 164C Advanced Volleyball; 165A Beginning Soccer; 165B Intermediate Soccer; 167B Intermediate Basketball; 167C Advanced Basketball.

Performance courses are instructional. Beginning, intermediate and advanced sections are offered for most performance courses. Students who already possess proficiency in an activity should consider the course chosen from the standpoint of the level of skill development that may be encountered, standards of proficiency expected and their own ability level. Initial assessment and determination will be made by the course instructor. May be taken for credit up to six times.

#### 170 - 186 Intercollegiate Sports (2)

Prerequisite: consent of coach. An intercollegiate activity in individual or team sports in an educational setting under the direction of a coach.

170 Gymnastics – Women Only; 172 Cross Country – Men and Women; 174 Track-Field – Men and Women; 175 Tennis – Women Only; 176 Wrestling – Men Only; 178 Basketball – Men and Women; 179 Baseball – Men Only; 180 Soccer – Men and Women; 185 Volleyball - Women Only; 186 Softball – Women Only. May be repeated for credit. Offered Credit/No Credit only.

<sup>\*</sup>Students who select the Comprehensive Examination shall be required to complete an additional adviser-approved 500-level course in Kinesiology (3 units).

### 190 Team Management (2)

Prerequisites: consent of coach and department chair. Field experience in managing an intercollegiate sport. May be repeated for maximum of eight units of credit. (Credit/No Credit only)

#### 191A Integrated Human Anatomy and Physiology (4)

Integrated introduction to human anatomy and physiology. Structure and function of the musculoskeletal, nervous and cardio-respiratory systems. For nursing majors and students interested in allied health professions; no credit toward Biological Science major. (3 hours lecture, 3 hours laboratory) (Same as BIOL 191A)

# 191B Integrated Human Anatomy and Physiology (4)

(Same as BIOL 191B)

#### 200 Introduction to Athletic Training (3)

Practical skills acquisition for the treatment, prevention and care of sports-related injuries. Basic required course for all students admitted to the Athletic Training Education Program. (2 hours lecture, 2 hours activity)

#### 202 Introduction to Kinesiology (3)

Prerequisite: declared Kinesiology major or minor. Human movement, including its role in daily life, its place in higher education and professional career opportunities in areas related to sport, movement, exercise and fitness. Multiple ways of knowing and studying human movement with a focus on the subdisciplines within kinesiology.

#### 210 Human Anatomy and Physiology (3)

(Same as BIOL 210)

# 214A Basic Scuba (3)

Prerequisites: ability to swim 400 yards, tread water one minute and swim 25 yards underwater. Skin and scuba diving, theory of diving, safety procedures and ocean environment. Open Water Basic Scuba Certification earned with successful completion. (1 hour lecture, 4 hours pool activity/ocean dives)

# 214B Intermediate Scuba (3)

Prerequisite: Open Water Scuba Certification. Application of scuba diving, including photography, navigation, salvage, game hunting, night diving and others. Advanced Scuba Certification for successful completion. (1 hour lecture, 4 hours pool activity/ocean dives)

#### 240 Teaching Team Sports (3)

Provides knowledge of the team sports of volleyball, basketball, soccer, softball and football, including histories, skills, rules, teach progressions and sport-specific teaching strategies. Appropriate teaching strategies are intended to promote active participation and experiential learning. (2 hours lecture, 2 hours activity)

### 241 Teaching Nontraditional Team Sports (3)

Prepares pre-service teachers (e.g., future Physical Education teachers) with knowledge of nontraditional team sports, including histories, fundamental skills, teaching progressions, sport-specific teaching strategies, sport rules, and officiating. (2 hours lecture, 2 hours activity)

### 242 Teaching Lifetime Physical Activity (3)

Provides knowledge, skills and experiences necessary to lead young people in gaining the skills, knowledge, attitudes and behaviors required to lead physically active lifestyles. Appropriate teaching strategies are used to promote active participation and experiential learning. (2 hours lecture, 2 hours activity)

### 246A Basic Hatha Yoga (2)

Basic Yoga postures, breathing and relaxation techniques, and beginning meditation techniques from theoretical and experiential perspectives. Awareness, concentration and breathing patterns that accompany the movements of Hatha Yoga. (1 hour lecture, 2 hours activity) (Same as CPRL 246A)

# 246B Intermediate Hatha Yoga (2)

Prerequisites: KNES/CPRL 246A. Intermediate and advanced yoga sequences, including postures, breathing practices, meditation techniques and guided relaxation. Yoga philosophy and movement based on various Hatha yoga traditions. (1 hour lecture, 2 hours activity.) (Same as CPRL 246B)

### 247 Yoga Instructor Preparation (3)

Prerequisites: one year of yoga experience or completion of KNES 246A. Recommended: concurrent enrollment in KNES 246B. Preparation for teaching Hatha Yoga techniques and philosophies to the general public. Yogic lifestyle and advanced yoga practices. (2 hours lecture, 2 hours activity)

#### 250 Mental Skills for Sport Performance (3)

Mental aspects of sport performance and learning mental skills that can be used to enhance sport performance. (Credit/No Credit only)

#### 256 Advanced Tai Chi (2)

Prerequisite: KNES 156. Improving understanding of history and philosophy of Tai Chi and deepening the practice of Tai Chi for greater health benefits. Lectures, discussions. Tai Chi, and related meditative practices. (1 hour lecture, 2 hours activity)

#### 260 Movement Anatomy (3)

Prerequisite: KNES /BIOL 210 or equivalent. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Muscular-skeletal system and its function in human movement. Movement in sports skills and the muscles involved.

#### 300 Principles of Human Movement (3)

Prerequisites: junior or senior standing, KNES 260. Pre- or corequisite: KNES 202; recommended: four of six units of approved performance courses, or KNES 240, 241, 242 for teacher education. General movement patterns as applied to sport and human movement. One or more sections offered online.

#### 320 Exercise Techniques for Strength Training (3)

Prerequisites: junior or senior standing, KNES 260; KNES 300 recommended. Practical experiences in resistance exercise lifting and spotting techniques. Free-weight exercises, such as squatting and Olympic lifting. How to properly set up and execute machine-based exercises.

### 325 Techniques of Coaching (3)

Factors related to coaching strategies and techniques: philosophy, ethics, legal issues, gender, multicultural and equity issues, leadership, motivation, team management, budget, recruiting, equipment purchase, skill acquisition, season planning, conditioning, nutrition and drugs.

#### 326 Theory and Application of Sports Officiating (3)

Prerequisites: junior or senior standing, KNES 202. Introduction to theory, techniques and principles of sports officiating; emphasizing practical application and steps necessary to become a sports official in individual and team sports at the youth, high school, collegiate and professional levels.

#### 342 Stress Management (3)

Kinesiology majors may count this course either for the major or for General Education. (Same as HESC 342)

# 348 Physiology of Exercise (3)

Prerequisites: junior or senior standing and KNES 210 or a human physiology course or equivalent. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Physiological processes in physical activities and the effect of training upon performance.

### 348L Physiology of Exercise Laboratory (1)

Prerequisite: prior completion or concurrent enrollment in KNES 348. Laboratory techniques in physiology of exercise. (3 hours laboratory)

### 349 Measurement and Statistics in Kinesiology (3)

Prerequisite: junior or senior standing. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Measurement theory and statistics used in evaluating health and human performance, with special focus on the analyzing and interpreting data in different environments. One or more sections offered online.

### 351 Principles of Strength and Conditioning (3)

Prerequisites: junior or senior standing, KNES 348; KNES 300 recommended. Conditioning for those who plan to coach or supervise fitness programs. Circuit training, nutrition, motivation, weight control and kinesiology factors.

#### 352 Principles of Teaching Group Fitness (3)

Prerequisites: KNES 210. Content knowledge and practical experience concerned with teaching group fitness. Teaching principles, techniques and safety. Variety of exercise formats.

### 353 Physical Activity and Lifelong Well-Being (3)

Prerequisites: one course from General Education (G.E.) Category B. Integrating physiological, psychological and sociological understandings of the human being in relationship to physical activity as a lifelong pursuit. Topics include physical fitness, nutrition, stress reduction, socialization, and individual differences in human behavior. Kinesiology and Health Science majors may count this course either for the major or for G.E. One or more sections offered online. (Same as HESC 353)

# 354 Cardiovascular Exercise Testing and Prescription (formerly 452) (3)

Prerequisites: KNES 348, 348L; KNES 351 recommended. Methods of graded exercise testing in the apparently healthy adult. Guidelines for aerobic exercise prescription. Cardiovascular disease and identification of risk factors.

# 363 Adapted Physical Education (3)

Prerequisites: junior or senior standing, KNES 364. Study of the disabled whose unique needs in motor development determine their least restrictive environment in physical activity. Programs of games, sports and exercise in diversified settings; legally mandated regulations.

#### 364 Motor Development (3)

Prerequisites: KNES 260. Life span motor development: age, sex, ethnic, cultural and perceptual components, their implications and the main course of action needed in developmental strategies for optimal motor behavior development.

#### 365 Prevention and Care of Athletic Injuries (3)

Prerequisites: KNES 202. Immediate observation and examination of injuries. Special emphasis on the etiology, pathology, signs, symptoms and complications related to injuries sustained by athletes.

#### 367 Clinical Proficiencies in Athletic Training I (2)

Prerequisites: Admission to ATEP. Develop a cognitive understanding and a practical knowledge of the various clinical skills required in a first-semester athletic training student.

### 368 Clinical Proficiencies in Athletic Training II (2)

Prerequisites: KNES 367. Develop clinical skills related to athletic training, including environmental safety, protective equipment, surface anatomy, palpation skills, special and functional tests, fitness testing techniques, etc.

### 369 Clinical Proficiencies in Athletic Training III (2)

Prerequisites: KNES 368. Develop clinical skills related to athletic training, including environmental safety, protective equipment, surface anatomy, palpation skills, special and functional tests, fitness testing techniques, etc.

#### 371 Human Motor Control and Learning (3)

Prerequisite: junior or senior standing and KNES 210 or a human anatomy course. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Neural, musculoskeletal and psychological mechanisms underlying the control and learning of movement skills across the lifespan.

#### 373 Advanced Injury Assessment of the Lower Extremity (3)

Prerequisites: KNES 365. Develop clinical skills related to the recognition, evaluation and assessment of pathologies to the lower extremity and lumbar spine.

### 374 Advanced Injury Assessment for the Upper Extremity (3)

Prerequisites: KNES 365. Develop clinical skills related to the recognition, evaluation, and assessment of pathologies to the upper extremity and cervical spine

#### 375 Management of Sport/Exercise Emergencies (3)

Prerequisite: KNES 202. Theoretical, practical and clinical basis for the recognition, treatment and management of medical emergencies and catastrophic situations involving the physically active individuals, including athletes.

#### 377 Therapeutic Exercise in Rehabilitation (3)

Prerequisite: KNES 202. Theoretical and clinical basis for therapeutic exercise in rehabilitation. Therapeutic exercises as they relate to injury rehabilitation will be developed for student syntheses and understanding.

#### 378 Therapeutic Modalities in Rehabilitation (3)

Prerequisite: KNES 202. Theoretical, clinical, and practical basis for the use of therapeutic modalities in rehabilitation. Develop physical agents and biophysics, indications, contraindications, physiological effects, and applications.

#### 380 History and Philosophy of Human Movement (3)

Prerequisites: junior or senior standing and completion of G.E. Categories C.2 and D.2. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Historical development of thought and practice in athletics, sport, kinesiology, play, dance, and other human movement forms from ancient Greeks to the present. Philosophical theories of human movement relative to personal identity, reality, being, values, and nature of competition.

#### 381 Sports, Games and Culture (3)

Prerequisites: junior or senior standing and one course from G.E. Category B, C or D. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Human movement in the cultural milieu. Historical and contemporary interpretations of the role of play, games, sports, dance and recreation in human life.

### 383 Psychology of Sport and Physical Activity (3)

Prerequisite: junior or senior standing. Pre- or corequisite: kinesiology majors, KNES 202; athletic training majors, KNES 200 or 365. Introduction to theory and research of psychological processes that influence human performance in numerous movement settings including sport, exercise, and rehabilitation. Topics include individual difference variables (e.g., personality, arousal/anxiety, and motivation), social psychological variables (e.g., aggression, leadership, and group dynamics), and assessment and intervention (e.g., goal setting, cognitive techniques, and behavioral change strategies).

#### 384 Sport Sociology (3)

Prerequisite: KNES 381. Sport and social institutions and social processes. Understanding sport as a social phenomenon.

# 385 Instructional Analysis of Human Movement (3)

Prerequisites: junior or senior standing, KNES 300; completion of all six performance course requirements; or Teacher Education, KNES 240, 241, 242 recommended. Variables and principles that contribute to effective observation, analysis and instruction of human movement skills across the life span.

#### 386 Movement and the Child (3)

Prerequisite: junior or senior standing; corequisite, KNES 494 for kinesiology teacher education majors only. Characteristics of the child; physical growth and development; basic mechanical principles related to human movement and motor learning; and concepts related to the design of physical activity programs that are appropriately challenging for children at various developmental levels.

### 387 Movement and the Adolescent (3)

Corequisite: KNES 494 for teacher education kinesiology majors only. Implement physical education programs at the secondary level. Cognitive, affective and psychomotor development; structure, concepts and principles related to human movement and motor learning; concepts related to the design of secondary school movement programs.

#### 396 Physical Education Tutorial (1)

Prerequisite: consent of instructor and tutorial adviser. Supervised experience in performance or laboratory situations through tutoring or assisting in instruction. May be repeated for six units of credit. A maximum of three units may be applied toward the major.

# 405 Worksite Injury Prevention and Rehabilitation (3)

(Same as HESC 405)

### 406 Principles of Sport and Exercise Management (3)

Prerequisite: junior, senior or graduate standing. Sport/ exercise management enterprise, including school, facility, professional, commercial, industrial, corporate management and specialists in marketing, print/electronic media. Job descriptions, professional preparation and placement opportunities are detailed. Portfolio development.

### 410 Issues in Youth Sports (3)

Prerequisites: junior, senior or graduate standing; KNES 381. Recommended prerequisite: CAS 312. Interdisciplinary examination of trends and issues in youth sport, focusing on non-school based community programs. Structural characteristics of sport and physical activity programs as they pertain to proper development of children and adolescents.

#### 414 Legal Issues in Kinesiology (3)

Prerequisite: graduate or upper-division standing; pre- or corequisite, KNES 202 or COMM 346. Introduction to the legal system and the law as applied to sport and exercise settings, which includes the areas of sports, fitness and healthcare, and recreational activities, with an emphasis on understanding the concepts of ethics, negligence and risk management.

### 430 Applied Sport Psychology (3)

Prerequisites: junior, senior or graduate standing; KNES 383. Application of principles from sport psychology literature to enhance athletes' and coaches' performance.

### 432 Applied Exercise Psychology (3)

Prerequisites: junior, senior or graduate standing; KNES 383. Understanding and applying the principles from exercise psychology to enhance competencies and skills related to preventive and rehabilitative exercise programs.

#### 442 Teaching Physical Education (3)

Prerequisite: admission to Teacher Education. Objectives, methods and materials of teaching Physical Education K-12. Required before student teaching. Part of the 12-unit education block and may not be taken separately. Credit/No Credit only. Requires "B" (3.0) or better for credit.

#### 449E Externship in Secondary Teaching (3)

(Same as EDSC 449E) To be taken concurrently with KNES 442. Credit/No Credit only. Requires "B" (3.0) or better for credit.

#### 449I Internship in Secondary Teaching (10)

(Same as EDSC 449I) Credit/No Credit only. Requires "B" (3.0) or better for credit.

#### 449S Seminar in Secondary Teaching (2)

(Same as EDSC 449S) Credit/No Credit only. Requires "B" (3.0) or better for credit.

#### 450 Program Design for Strength and Conditioning (3)

Prerequisites: junior, senior or graduate standing; KNES 351. Outcomes associated with different strength training regimens. Periodization and planned variation of the acute program variables of frequency, intensity, volume and rest across cycles of training to prevent overtraining and promote peak performance.

#### 451 Sports Medicine (3)

Prerequisites: junior, senior or graduate standing; KNES 348, 348L. Alterations in human movement, anatomy and physiology that are caused by such factors as injury, drugs and environment.

#### 453 Clinical Exercise Physiology (3)

Prerequisites: junior, senior or graduate standing; KNES 348. Application of exercise physiology concepts to clinical/pathological situations in order to determine the therapeutic and functional benefits of physical activity.

#### 454 Physical Dimensions of Aging (3)

Prerequisites: junior, senior or graduate standing; minimum six upper-division kinesiology units completed or six units from gerontology minor. Scientific evidence concerning the relationship between level of physical activity and one's physical, mental and psychological well-being during aging.

# 455 Functional Performance Assessment and Programming for Older Adults (3)

Prerequisites: junior, senior or graduate standing; KNES 349 and 353, 371 or 454. Developing technical and personal skills related to functional performance assessment and to the development and implementation of physical activity programs for healthy and frail older adults.

### 456 Environment Exercise Physiology (3)

Prerequisites: junior, senior or graduate standing; KNES 348. Interrelationship between the physical environment and the human while exercising under different states of fitness and acclimatization.

# 457 Practice of Personal Training (3)

Prerequisites: junior, senior or graduate standing; KNES 351, 354. KNES 300 recommended. Physiological responses and adaptations associated with strength and aerobic training to design fitness programs across the lifespan. Scientific foundation, client evaluation, exercise technique, safety and legal issues, program design and special populations.

#### 460 Worksite Health Promotion (3)

(Same as HESC 460)

### 461 Biomechanical Analysis of Human Movement (3)

Prerequisites: junior, senior or graduate standing; KNES 300, PHYS 211 recommended. Analytical approach to mechanics of human motion. Quantitative video analysis techniques are introduced and applied to select movement analysis projects.

# 463 Biomechanics of Musculoskeletal Injury (3)

Prerequisites: junior, senior or graduate standing; KNES 300. Biomechanical analysis of bone, joint cartilage and collagenous tissue, and of forces and moments acting at the major joints of the human body with specific interest on how these forces contribute to musculoskeletal injuries.

### 465 Administration and Leadership in Athletic Training (3)

Prerequisites: junior, senior or graduate standing; KNES 365. Theoretical, legal, moral, ethical, technical and practical aspects of administration and leadership in sports healthcare programs, including those in athletic training.

#### 468 Clinical Proficiencies in Athletic Training IV (2)

Prerequisites: junior, senior or graduate standing; KNES 369. Develop a cognitive understanding and a practical knowledge of various clinical skills required of a fourth-semester athletic training student.

#### 469 Clinical Proficiencies in Athletic Training V (2)

Prerequisites: junior, senior or graduate standing; KNES 468. Develop a cognitive understanding and a practical knowledge of various clinical skills required of a fifth-semester athletic training student.

#### 470 Nutrition for Exercise and Performance (3)

Prerequisites: junior, senior or graduate standing; KNES 348. Role of different nutrients (macro and micro) to provide energy during exercise, enhance performance and support recovery after exercise. Fluid replenishment, ergogenic aids, nutritional supplements, nutritional immunology and the female athlete.

#### 471 Motor Control and Movement Dysfunction (3)

Prerequisites: junior, senior or graduate standing; KNES 371. Contemporary motor control theories and how they are applied to the development of therapeutic exercise programs for children and adults with balance and movement disorders caused by disease and/or trauma to the neurological system.

# 480 Gender Issues and Sport (3)

Prerequisites: junior, senior or graduate standing; KNES 381 or completion of G.E. Categories D.1 and D.5. Multidimensional focus of influences impacting women's competitive and non-competitive sport participation with emphasis on access, inclusion, adherence, benefits/liabilities and lifelong well being.

### 494 Practicum (1-3)

Prerequisites: junior, senior or graduate standing; consent of faculty sponsor, field supervisor, fieldwork coordinator and department chair. Planning, preparing, coaching, teaching in public school, college or community physical education or recreation programs. May be repeated for a maximum of six units of credit. Credits not applicable toward major or fifth year work. (Credit/No Credit only)

### 495 Internship in Kinesiology (3)

Prerequisites: minimum of 12 units of upper-division kinesiology coursework completed, faculty sponsor, field supervisor, fieldwork coordinator and department chair consent. Seminar for analysis of field experiences, including appropriate theory, skills and techniques, in addition to supervised experience in an approved fieldwork location agency. Internship must be specific to the discipline of kinesiology. Minimum of 120 hours per semester. Application forms must be completed and approved prior to enrollment. May not be repeated for credit toward the major.

#### 499 Independent Study (1-3)

Prerequisite: minimum of 15 upper-division kinesiology courses completed. Topics based on a study plan prepared in cooperation with a faculty supervisor. Culminates in a paper, project, comprehensive examination or performance. Application forms must be completed and approved prior to enrollment. Maximum of three units in any one semester; may be repeated once.

### 508 Statistical Methods in Kinesiology (3)

Prerequisites: graduate status, KNES 349. Statistical theory, data collection procedures, techniques for analysis and interpretation of data.

### 510 Research Methods in Kinesiology (3)

Prerequisites: graduate status, KNES 508. Fundamental tools of research. Types of research, process of scientific inquiry and critical analysis of research. Topic selection and development of a research proposal.

# 516 Advanced Study of the Philosophical Perspective of Human Movement (3)

Prerequisites: graduate status, KNES 380. Methods of the philosophical process of human movement.

#### 550 Graduate Internship (3)

Prerequisites: graduate status, consent of faculty sponsor, field supervisor, field coordinator and chair. On-the-job training experiences supervised by a fully trained practitioner. Minimum of 120 hours per semester plus conferences with faculty sponsor. Application forms must be completed and approved prior to enrollment. Upon completion of the internship, a written evaluation must be submitted. Not open to students on, or subject to, academic probation.

### 551 Advanced Study in Physiology of Exercise (3)

Prerequisites: graduate status, KNES 348, 348L. Current issues and research in physiology of exercise with emphasis on physiological control during acute exercise. Includes written, oral and laboratory assignments.

#### 555 Applied Strength and Conditioning (3)

Prerequisites: graduate status, KNES 351, 551. Anatomical and physiological bases for programs that develop physical fitness and performance.

# 557 Instructional Strategies in Physical Education and Sport (3)

Prerequisites: graduate status, KNES 371 or 383. Theoretical concepts, models and research on instructional strategies for Physical Education, sport and related professional setting. Highly recommended for graduate students in all concentrations in Physical Education.

#### 558 Advanced Study in Teaching Human Movement (3)

Prerequisites: graduate status, KNES 300 or 371 or consent of the instructor. Historical perspectives and current trends in pedagogical research and the resultant principles that undergird the science of teaching human movement.

#### 561 Advanced Study in Biomechanics (3)

Prerequisites: graduate status, KNES 461. Advanced methods and concepts associated with the quantification of human movement. Biomechanical analysis of force plate and three-dimensional video data.

# 571 Advanced Study in Human Motor Control and Learning (3)

Prerequisites: graduate status, KNES 371. In-depth study of contemporary trends and issues in motor control/learning research. Application of research to practice.

### 580 Advanced Study in Sport and Exercise Psychology (3)

Prerequisites: graduate status, KNES 383. Current issues and research in sport and exercise psychology. Topics include motivation, personality, leadership and group dynamics, attention/concentration, exercise adherence/compliance, sport and exercise injury, and behavioral change strategies.

# 581 Consultation in Applied Sport Psychology (3)

Prerequisites: KNES 383, 430 and graduate standing. Factors related to effective consultation for enhancing athletic performance. Knowledge of consultation issues will be derived from the existing best practices and literature with the purpose of drawing practical applications for the new professional. May be repeated for a maximum of six units credit.

#### 582 Advanced Study in Sociocultural Perspectives of Human Movement (3)

Prerequisites: graduate status and KNES 384. In-depth study of theories and methods of the sociocultural perspective and their application to the study of human movement phenomena.

#### 597 Project (3)

Prerequisites: graduate classified status, KNES 510, successful completion of an oral presentation of the project, and signature of all committee members on or before the census date of the semester in which the student elects to enroll. Directed independent inquiry. Not open to students on, or subject to, academic probation.

#### 598 Thesis (3)

Prerequisites: graduate classified status, KNES 510, successful completion of an oral presentation of the thesis, and signatures of all committee members on or before the census date of the semester in which the student elects to enroll. Student will select and have approved a research proposal, conduct the research, and prepare a formal analysis and report. May be repeated. Not open to students on, or subject to, academic probation.

#### 599 Graduate Independent Research (1-3)

Prerequisites: graduate status, KNES 510, and consent of the faculty adviser and chair. Student research in a specific area of human movement studies. Application forms must be completed and approved prior to enrollment. Upon completion of the research, a written report must be submitted. Not open to students on, or subject to, academic probation. Maximum of three units in any one semester; may be repeated once.