

# Texas Christian University Bulletin

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## **Graduate Studies 2002-2003**

Bulletin for the 130th academic year

[AddRan College of Humanities and Social Sciences](#)

[College of Communication](#)

[College of Fine Arts](#)

[College of Health and Human Sciences](#)

[College of Science and Engineering](#)

[M. J. Neeley School of Business](#)

[School of Education](#)

[Office of Graduate Studies and Research](#)

This Bulletin is for academic planning purposes and does not constitute a contract between any applicant, student, or faculty member and Texas Christian University. University Requirements for Graduation, as stated in this Bulletin, will remain in effect for six (6) years from the date of first enrollment.

The University reserves the right to change programs of study, academic requirements, assignment of lecturers, student charges, teaching staffs, or the announced academic calendar without prior notice, in accordance with established procedures.

Matriculation is a privilege not a right. The University reserves the right to control enrollment in specific programs by limiting admission of new students, denying requests to change majors, or establishing other requirements specifically to limit the number of students in that degree program.

With the exception of University Requirements for Graduation, other policies and procedures may change annually. Those delineated in the current Bulletin shall be considered in effect at the time.

### **Accreditation**

Texas Christian University is accredited by the Commission on Colleges of the Southern Association of Colleges and Schools, 1866 Southern Lane, Decatur, Georgia, 33033-4097; Telephone number 404-679-4501; toward bachelor, master and doctorate degrees.

### **Notice of nondiscriminatory policy as to students**

Texas Christian University does not discriminate on the basis of personal status, individual characteristics or group affiliation, including but not limited to classes protected under federal and state law.

# The Neeley Advantage

## Overview

The Neeley Advantage

**Personalized Environment.** Small class sizes and a dedicated, accessible faculty enable students to fulfill their individual education needs.

**Unique Applied Learning Opportunities.** Neeley School students put business theory into practice throughout the curriculum and through several innovative programs. Students in the *Educational Investment Fund*, one of the largest student-run investment portfolios in the nation, manage over \$1.7 million. Through the *Student Enterprise Program*, teams of students are hired as consultants by companies to solve real business problems. The highly successful *Summer Internship Program* provides opportunities for professional level experience in a broad range of industries.

**Development of Key Managerial Skills.** The Neeley School has been widely recognized for helping students develop the skills to be successful in a managerial environment-effective communication, technology, leadership and team skills. Dedicated resources, such as the Center for Professional Communication, provide students with personal assessment and development opportunities.

**Professional Development Program.** More corporate management development programs are focusing on "soft skills" in the workplace and giving hiring preferences to MBA candidates who have them. The Professional Development Program develops soft skills like valuing diversity, behaving ethically, working well in teams, expressing yourself effectively, following etiquette rules, listening to others, responding appropriately, making presentations and networking. Such skills make MBAs more employable and more promotable in today's organizations.

**Ties to Industry.** Our close ties to the business community enrich the student experience in the Neeley School. Industry leaders provide input on the knowledge and skills that will give our graduates a competitive edge. Students interact frequently with executives through guest lecture series, industry led perspective seminars, field studies and other executive programs.

**Ryffel Center for Entrepreneurial Studies.** The mission of the center is to build the skills, capabilities, and confidence of prospective entrepreneurs. Students will be able to enroll in a variety of entrepreneurship offerings at the graduate level. The center will help develop internship opportunities with entrepreneurial companies to give students an outstanding experiential learning opportunity during their time at TCU. Other offerings supported by the center include speakers, seminars, and competitions through the Collegiate Entrepreneurs Organization (CEO). CEO members will be assigned mentors from the entrepreneurial community to discuss their possible future as an entrepreneur. Upon completion of the Sarah and Steve Smith Entrepreneurs Hall, students will attend classes and participate in programs in a state of the art entrepreneurial focused facility.

**Luther King Capital Management Center for Financial Studies.** The Luther King Capital Management Center for Financial Studies promotes excellence in financial education by enhancing the quality, prestige, and national visibility of finance programs in the Neeley School of Business at TCU. The Finance Center pursues these goals by: (1) providing resources to support a faculty research environment and scholarly activities in finance that are competitive with the very best universities. (2) reaching out to industry for advice and resources for finance programs and employment opportunities for Neeley School students. (3) sponsoring seminars, awards and other activities that enhance the national reputation of finance programs at TCU. (4) attracting top students into the finance programs at TCU. (5) engaging in revenue generating activities that are consistent with excellence in financial education and add to the prestige and reputation of the Neeley School.

**Supply and Value Chain Center.** The mission of the Supply and Value Chain Center is to help businesses create value for customers and stakeholders and improve business performance through the integration of supply and value chain processes across internal functions and with external partners. Developing students to be tomorrow's supply chain leaders is a primary focus. The Center sponsors and encourages activities that enable students to network with the business community and participate in seminars and professional meetings to learn from the real-world experience of supply chain professionals. Beginning Fall 2002, the Neeley School will offer an MBA with a Certification in Supply Chain Management designed to provide tomorrow's supply chain leaders with a global perspective and solid combination of technical, relationship management, communication, and leadership skills. Students complete the MBA core requirements the first year of their MBA program, with a supply-chain related internship (providing a hands-on experience tackling supply chain problems) and 12 hours of supply-chain coursework in the second year.

**Neeley School Professional graduate degrees:** The Master of Business Administration (MBA), The Master of Accounting (MAc), The Master of International Management (MIM/MMNI)

**Neeley School Dual-degree MBA programs:** MBA/Ed.D in Educational Leadership, MBA/Ph.D in Physics, and MBA/MA in Environmental Sciences.

The Neeley School is fully accredited by the AACSB-International Association for Management Education and is a member of the Graduate Management Admissions Council (GMAC).

# The Neeley School Graduate Programs

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## **MBA Programs**

The Master of Business Administration (MBA) degree at TCU is a professional degree designed to provide graduates with the broad business background necessary for a career in management. The emphasis is on the most current concepts, processes and analytical methods of business administration.

Because managers seldom face problems that fit neatly into a single functional area, such as finance or marketing, the Neeley School has designed an MBA curriculum with a strategic, integrated perspective of business. Required courses cover business principles-finance, marketing, operations, business strategy, accounting, management and information systems. Electives allow for more detailed study in one or more areas. This broad curriculum fosters strategic, managerial thinking and provides our graduates with career flexibility.

The Neeley School recognizes that it takes more than technical expertise to succeed in today's dynamic business environment. Through the combined efforts of our faculty and corporate partners, we have developed a curriculum that integrates sound business fundamentals with multiple opportunities to round out the academic experience. Communication skills, team-building, technology and hands-on learning are equally emphasized at the Neeley School-both inside and outside of the classroom. Classroom instruction is tied to the business world through guest presentations by visiting executives and corporate-based field projects. Hands-on application, team problem-solving, case study and lecture teaching formats are all used by faculty. The environment is highly interactive and team-oriented.

## **Students**

The Neeley MBA Program attracts a diverse group of students. As a private university, TCU does not serve a defined geographic area. Our objective is to bring talented students from many backgrounds to share experiences and learn from each other. Approximately 30% of our full-time MBA students come from outside the U.S. Of the remaining students, about half are from Texas and half from other parts of the U.S.

Neeley School MBA students also come from a broad range of academic and professional backgrounds. About half of the students hold undergraduate degrees in business. The others have majored in engineering, liberal arts, science/technology, fine arts or another subject area. On average, our full-time MBA students have completed almost three years of professional experience after completing their undergraduate degrees. The average work experience for evening students is generally much higher.

## **Neeley MBA Program Options**

Day (Full-Time) Program

Program Length: Two Years

Professional (Part-Time) Evening Program

Program Length: Twenty-eight to Thirty-three Months

Accelerated MBA Program

Program Length: Twelve Months

Executive MBA Program

Program Length: Twenty-one Months

Three-Two Option for TCU Students

Applicants must designate at the time of application which program of study they are seeking. Admission to one program is not necessarily valid for the other. Students will not be allowed to switch programs except under extraordinary circumstances.

## **Full Time MBA Program**

The Day Program must be completed within two academic years in the prescribed sequence. Any variance from this sequence must be preapproved by the MBA Academic Program Director. If such preapproval is not obtained and a break in the sequence occurs, the student is subject to dismissal.

**A total of 54 credit hours is required in this program.**

**First Year\***

**Fall**

ACCT 60013 Financial Reporting (3 credit hours)  
 FINA 60003 Economic Environment of Business (3 credit hours)  
 MANA 60003 Business Strategy and Structure (3 credit hours)  
 MANA 60033 Managing People (3 credit hours)  
 Integrative Project

**Spring**

ACCT 60023 Accounting for Managerial Planning & Control (3 credit hours)  
 DESC 60013 Data Analysis for Managerial Decisions (3 credit hours)  
 FINA 60013 Management of Financial Resources (3 credit hours)  
 MANA 60043 Managing Information Technology (3 credit hours)  
 MARK 60013 Market Driven Strategy (3 credit hours)  
 Integrative Project

*\*Students are also required to attend a series of industry-led seminars during the first year of the program.*

**Second Year**

**Fall**

DESC 60023 Manufacturing and Services Operations Management (3 credit hours)  
 MANA 60023 Legal and Social Environment of Business (3 credit hours)  
 Nine credit hours of electives

**Spring**

MANA 60063 Strategic Management in a Global Environment (3 credit hours)  
 Nine credit hours of electives

**Professional MBA (Evening) Program**

**A total of 48 credit hours is required in this program.**

**28-Month Plan**

**First Year\***

**Fall**

ACCT 60013 Financial Reporting (3 credit hours)  
 MANA 60033 Managing People (3 credit hours)

**Spring**

ACCT 60023 Accounting for Managerial Planning & Control (3 credit hours)  
 MANA 60003 Business Strategy and Structure (3 credit hours)

**Summer**

DESC 60013 Data Analysis for Managerial Decisions (3 credit hours)  
 FINA 60003 Economic Environment of Business (3 credit hours)

**Second Year\***

**Fall**

FINA 60013 Management of Financial Resources (3 credit hours)  
 MARK 60013 Market Driven Strategy (3 credit hours)

**Christmas Break**

International Experience Option I (optional elective) (3 credit hours)

**Spring**

DESC 60023 Manufacturing and Services Operations Management (3 credit hours)  
 MANA 60023 Legal and Social Environment of Business (3 credit hours)

**Mini-Semester or Mini-Term**

International Experience Option II ( optional elective) (3 credit hours)

**Summer**

Six credit hours of electives

*\*Students are also required to attend a series of industry-led seminars during the first and second years of the program.*

**Third Year**

**Fall**

MANA 60063 Strategic Management in a Global Environment (3 credit hours)  
 MANA 60043 Managing Information Technology (3 credit hours)

**33-Month Plan**

Same requirements as above except International Experience Options I and II are not taken and six hours of electives are taken in the spring semester of the third year.



Students must make every effort to take the courses in the prescribed sequence. Failure to do so may cause a significant delay in program progress. In any event, it is required that students complete all requirements for graduation within five years of their original admission to the program. Any break in program progress must be preapproved by the MBA Academic Program Director. If such pre-approval is not obtained, the student is subject to dismissal.

### **Accelerated MBA Program**

The Accelerated MBA Program is a 12-month, full-time option designed for individuals with significant professional experience and a distinguished academic background in business. The accelerated MBA Program is designed to build upon the business foundation and experience of these individuals

### **Organization of the Program**

Students in the Accelerated MBA Program will pursue a fast-paced, individually tailored curriculum that compliments their own unique business background. The curriculum will include a subset of the courses offered in TCU's traditional MBA Program, carefully selected in cooperation with the MBA Academic Program Director and based on the student's professional and academic credentials. It is comprised of 36 credit hours of graduate-level business courses: 18 credit hours of graduate business electives and 18 credit hours selected from the following MBA core classes: ACCT 60013, ACCT 60023, DESC 60013, DESC 60023, FINA 60003, FINA 60013, MANA 60003, MANA 60033, MANA 60043, MANA 60063 AND MARK 60013. The 36 semester hours are completed over the course of three consecutive semesters-fall, spring and summer. Students are admitted in the fall semester only.

Like the traditional program, the objective of the Accelerated MBA Program is to provide graduates with the strategic, integrated perspective of business needed to support managerial decision making and provide career flexibility.

Students in the Accelerated MBA Program will benefit from many of the features of the traditional program. The program integrates sound business fundamentals with multiple opportunities to round out that experience. Communication skills, team building, technology and experiential learning are emphasized throughout the program. The learning environment is highly interactive and team-oriented.

### **Prior Educational and Professional Background**

The Accelerated MBA Program is available to individuals with professional experience and a distinguished academic background in business, as evidenced by:

- Completion of the Bachelor of Business Administration (BBA) degree or equivalent with a strong academic record at an institution accredited by the AACSB International (Association for the Advancement of Collegiate Schools of Business).
- Minimum of three years of post-graduate professional work, or military experience.
- Minimum total score of 620 on the Graduate Management Admission Test (GMAT).

### **Executive MBA Program**

The Executive MBA Program is designed for accomplished and rising leaders who want to accelerate their careers while continuing to maintain significant responsibilities at work. The program taps into the extensive management and operating experience of its participants and builds on that experience by exposing them to challenging new ideas, technologies, concepts, theories and applications that reflect the most up-to-date thinking in today's global business. Executive MBA students learn to identify, evaluate and exploit new opportunities faced by business as a result of changes in the marketplace. Students attend classes on Friday and Saturdays of alternating weekends.

### **First Year**

#### **Fall**

#### **First Eight-Week Session**

ACCT 65013 Financial Reporting and Analysis  
MANA 65003 Business Strategy and Structure

#### **Second Eight-Week Session**

DESC 65013 Statistics for Managerial Decisions  
FINA 65003 Economic Environment of Business

#### **Winter/Spring**

#### **First Eight-Week Session**

FINA 65013 Management of Financial Resources  
ACCT 65023 Accounting for Managerial Planning and Control

#### **Second Eight-Week Session**

FINA 75543 Advanced Financial Management  
MARK 65013 Advanced Marketing Management

#### **Summer**

BUAD 75973 The Global Environment of Business

### **Second Year**

#### **Fall**

#### **First Eight-Week Session**

MANA 65033 Building High Performance Work Systems

MANA 65043 Electronic Business

### **Second Eight-Week Session**

MANA 75763 Transformational Leadership  
DESC 65023 Operations Management

### **Winter/Spring**

#### **First Eight-Week Session**

MANA 65023 Legal and Social Environment of Business  
Group-Determined Elective

#### **Second Eight-Week Session**

MANA 65063 Strategic Management in a Global Environment  
Group-Determined Elective

### **Three-Two Option for TCU Students**

The Three-Two Program, which is available only to TCU undergraduates in participating TCU colleges and schools, allows students to combine a bachelor's degree in a non-business field with the Master of Business Administration (MBA) in only five years.

Students spend their first three years in the AddRan College of Humanities and Social Sciences, College of Science and Engineering, College of Communication, or College of Fine Arts completing the University Curriculum Requirements and the requirements of an approved major. By the end of their third year, Three-Two Program students must complete at least 100 hours in non-business courses, including sufficient coursework and mathematics to satisfy the MBA Program prerequisites. To be considered for admission to the MBA program, Three-Two Program participants must submit the usual MBA application during their third year of study, including scores for the GMAT (Graduate Management Admission Test). Only Three-Two candidates demonstrating superior undergraduate academic performance and very high GMAT scores will be considered for admission.

If admitted to the MBA Program, the student completes the first 27 semester hours of the MBA program during the fourth year of study. These courses apply to both the undergraduate degree, and toward the MBA degree. Candidates should work with their undergraduate academic advisors to determine how the courses will apply to the undergraduate degree (electives, minor requirements, area of emphasis, etc.). At the end of the fourth year, assuming that all other graduation requirements are met, the student earns his or her undergraduate degree (electives, minor requirements, area of emphasis, etc.). During the fifth year the student completes the remaining 27 semester hours of MBA courses.

### **General MBA Requirements**

Students admitted to the MBA program must complete three pre-enrollment requirements prior to registering for their first semester of graduate study. These requirements are:

#### **Mathematical Skills Prerequisite**

Entering students are expected to have an understanding of **basic** mathematics, i.e., basic algebraic operations, relations and functions, exponents, logarithms, sets and functions, linear equations, differentiation, integration, slope, and extrema. This requirement is ordinarily satisfied by one of the following:

1. Satisfactory (i.e., with a grade of "**C**" or better) completion of a three-hour course in **Introductory Applied Calculus** or **College Algebra** or **Mathematics with Emphasis on Business Applications**;
2. A score corresponding to or better than the 80th percentile on the quantitative portion of the GMAT test; **or**
3. **Satisfactory evidence of mathematical competence** through a combination of courses taken in mathematics, statistics, or economics prior to entering the program, **and/or** a make-up course that may be taken during the first semester of the Neeley School MBA Program. **[For specific details, please contact the Neeley Graduate Programs Office.]**

#### **Satisfactory completion of the TCU START Workshop.**

The START Workshop is held on campus the week before fall classes begin.

### **Associated MBA Curriculum Requirements**

#### **Industry-Led Perspective Series: Full-Time, Professional, and Accelerated MBA Programs**

Senior-level executives explore the issues and trends currently faced in business in this required series of seminars. Topics will vary, but may focus on global issues, emerging technology or the impact of cultural diversity on organizations. Please refer to discussion under "Academic Policies."

#### **The Integrative Project: Full-Time MBA Program**

The project, typically a case study, requires student teams to integrate and apply creatively the knowledge acquired throughout the semester. Full-time students complete the projects at the end of each semester in their first year of study.

#### **Professional Development Program: Full-Time, Professional, and Accelerated MBA Programs**

The Professional Development Program (PDP) is designed to address areas important to success but not always covered by curriculum. The PDP provides students an assessment of their personal and professional skills in the following areas: problem solving, leading change, communicating, team building, self awareness, global dimensions, and career management. The assessment results guide the student in formulating an individualized plan for skill development in the areas in which they may be deficient. Students earn a Professional Development Certification

upon completion of the required workshops.

## **Master of Accounting (MAc)**

### **Overview**

The MAc program is designed for students planning on professional careers in accounting. It complements the educational experience of the BBA accounting major by providing the additional accounting and business knowledge needed by successful public accounting practitioners. The MAc seeks to provide a solid foundation for entry into the public accounting profession by helping students develop the abilities to:

- enhance their knowledge of business and accounting and apply it to give valuable services to clients,
- communicate clearly and effectively to clients and each other both orally and in writing,
- work effectively in groups,
- use information technology effectively and deal with technological developments,
- continue to learn with a commitment to lifelong learning and continuing professional development.

### **Organization of the MAc Program**

The MAc program, an integral part of TCU's five-year accounting program, is designed to prepare students for professional accounting careers and to provide an educational background that meets the requirements to sit for the Uniform CPA Examination. The program is comprised of 30 semester hours of graduate-level classes: 15 semester hours of required accounting classes and 15 semester hours of graduate business elective courses. Students are expected to complete the program in one year.

### **Prior Educational Background**

Students must complete a four-year undergraduate degree and have completed 24 semester hours of accounting before entering the MAc program. Students who have not completed the TCU BBA accounting major must provide evidence that they have completed a comparable program. Students with deficiencies in their educational backgrounds may be admitted to the MAc program but will be required to remedy these deficiencies and complete all requirements for the MAc before the degree will be awarded.

### **MAc Program Schedule**

#### **Fall Semester**

ACCT 70273 Auditing (3 credit hours)  
ACCT 70303 Advanced Federal Taxation (3 credit hours)  
Nine credit hours of electives

#### **Spring Semester**

ACCT 70003 Business Law for Accounting Professionals (3 credit hours)  
ACCT 70053 Contemporary Accounting Issues (3 credit hours)  
ACCT 70153 Financial Statement Analysis (3 credit hours)  
Six credit hours of electives  
Graduate business electives are selected in consultation with the student's academic advisor.

## **Master of International Management Program MIM/MMNI**

This is a joint degree with TCU's partner university in Mexico, the Universidad de las Américas (UDLA). The mission of the program is to prepare students for careers in international business. The program's unique two-university and two-country setting is particularly relevant to U.S. students who are interested in doing business in Mexico and students from Mexico who want to do business in the U.S. Upon completion of the program students receive the Master of International Management (MIM) from TCU and the Maestría en Marketing y Negocios Internacionales (MMNI) from UDLA. The MIM requires 40 credit hours with 20 credits to be taken at TCU and the equivalent of 20 credits to be taken at UDLA. Only students pursuing the joint MIM and MMNI degree program at both TCU and UDLA are eligible for admission.

Admission decisions for the MIM program are made by the Neeley School but are contingent upon admission to the MMNI program by UDLA. Students entering the program must have a bachelor's degree in business and must be proficient in English and Spanish. Applicants whose native language is not Spanish must demonstrate proficiency as follows: by completion of 18 U.S. semester credit hours in Spanish, by examination, or receipt of a degree from a university in a Spanish speaking country. Other admissions requirements for the MIM are presented in the section on admissions.

### **Program of Study**

Students must submit a plan of study approved by the Academic Director of the MBA program and endorsed by the Associate Dean for Graduate Programs.

Approval will be based on coordination of coursework required for UDLA's MMNI curriculum, the student's career interests, and remediation of deficiencies in the student's undergraduate background.

Students take the bulk of their coursework from existing MBA elective courses. Where there is a weakness in a student's background some core courses are included.

Students are required to complete an internship in Mexico for two credits. In the event that an internship cannot be obtained other coursework can be substituted for the requirement.

## **Dual-Degree MBA Programs**

### **MBA/Ed.D in Educational Leadership**

The purpose of this program is to prepare students to assume major leadership positions in a wide variety of

education-related organizations by applying managerial skills and educational leadership in the field of education. The program is designed to prepare students to enter educational management in school systems, regional, state, or federal governments, research institutions, private foundations, or private sector companies. Details about this program are provided in the Education section of the Graduate Catalog.

### **MBA/Ph.D in Physics**

The M.J. Neeley School of Business and the Physics Department offer the Ph.D. in physics with a business option. Details about this program are provided in the Science and Engineering: Physics and Astronomy-section of the Graduate Catalog.

### **MBA/MA in Environmental Sciences**

Economic and environmental concerns are increasingly intertwined. Many of today's business decisions must deal with both traditional management concerns as well as environmental issues. Decision-makers who deal with environmental issues must also have an understanding of accounting, finance, information systems, management, marketing and other business functions. Because of the growing importance of environmental issues, there is need for business leaders who have specialized knowledge of both areas. TCU's College of Science and Engineering and the Neeley School have created this unique offering as a joint degree program. Early, appropriate advising is essential for students in this highly structured program. In addition, students must spend at least 135 hours in approved practical work experience with an organization or company approved by the TCU MBA/MA Program. Open only to MBA/MA students.

The M.J. Neeley School of Business and the College of Science and Engineering jointly admit students to this program.

***A total of 60 credit hours are required in this program.***

#### **First Year**

##### **FALL**

ACCT 60013 Financial Reporting (3 credit hours)  
FINA 60003 Economic Environment of Business (3 credit hours)  
MANA 60003 Business Strategy & Structure (3 credit hours)  
MANA 60033 Managing People (3 credit hours)  
GEOL 60493 Hydrogeology; BIOL 50103 Terrestrial Ecosystems; or GEOL 50731/41/51 Remote Sensing Modules (3 credit hours)

##### **SPRING**

ACCT 60023 Accounting for Managerial Planning and Control (3 credit hours)  
DESC 60013 Data Analysis for Management Decisions (3 credit hours)  
MARK 60013 Market Driven Strategy (3 credit hours)  
FINA 60013 Management of Financial Resources (3 credit hours)  
MANA 60043 Managing Information Technology (3 credit hours)

#### **Second Year**

##### **FALL**

BIOL/GEOL 50883 Environmental Engineering Technology (3 credit hours)  
MANA 60023 Legal & Social Environment of Business (3 credit hours)  
BIOL 50713 Marine Ecology (3 credit hours)  
GEOL 50493 Physical Hydrogeology (3 credit hours)  
GEOL 50712 and 50721 Environmental Geology/Geographic Information Systems (3 credit hours)

##### **SPRING**

MANA 60063 Strategic Management in a Global Environment (3 credit hours)  
BIOL 50313 Biogeography (3 credit hours)  
BIOL 50703 Ecology of Lakes and Streams (3 credit hours)  
GEOL 50783 Environmental Chemistry (3 credit hours)  
BIOL/GEOL 70003 Environmental Internship (3 credit hours)

### **Academic Policies for All Neeley School Graduate Programs**

#### **Transfer Credit**

A student who has completed a course that is the equivalent of a required course in the Neeley School MBA or MAC Program may, with the permission of the MBA Academic Program Director (MBA students) or Accounting Department Chair (MAC students), substitute an elective in the same functional area. In order for such substitution to be approved, the course has to have been taken within three years of entering TCU and must have been from a graduate business school accredited by the AACSB. The substitution of a required course will not reduce the number of hours required to complete the MBA or MAC Program.

A student who has, prior to entering the Neeley School, completed graduate-level business courses that would qualify as electives at TCU may seek the approval of the MBA Academic Program Director to transfer a maximum of six hours of such coursework. Such approval will only be granted if the courses were taken at an AACSB accredited program no more than three years before entering TCU.

A student presently enrolled in the TCU MBA or MAC Program may, under extraordinary circumstances, seek approval from the MBA Academic Program Director or Accounting Department Chair to take a maximum of six hours outside the University. These transfer credits (when approved by the Director or Chair) will reduce the

number of hours required to complete the MBA or MAc Program on a one-to-one basis. When a course is taken outside the Neeley School for which elective credit is sought, the course must be equivalent to a 60000 level course or higher.

### Grading Procedures

The grading policy followed for all graduate business courses is given by the following scale:

Letter Grade	Grade Point Weight
A+	4.0
A	4.0
A-	3.7
B+	3.3
B	3.0
B-	2.7
C+	2.3
C	2.0
C-	1.7
D	1.0
F	0.0

### Academic Standards

All graduate students are required to meet the academic standards of the Neeley School faculty. Failure to do so will result in academic probation or academic suspension.

Graduate students must achieve a grade index of at least 2.75 each semester and on a cumulative basis throughout their program. A student in the MBA or MAc Program who does not meet this standard will be placed on probation for the subsequent semester, excluding summer. During this time, the student must achieve the minimum grade index (2.75) on both a semester and cumulative basis to be removed from probation. Failure to do so will result in dismissal from TCU (with the right of appeal to the Dean of the Neeley School).

A student who is placed on academic probation for one semester will be dismissed if his or her semester or cumulative grade index falls below a 2.75 in *any* subsequent semester.

### Dismissal, Suspension, or Expulsion for Lack of Academic Progress or Honor Code Violations (for Graduate Students)

Graduate students in the Neeley School must abide by the Honor Code. Students violating the Honor Code may be dismissed from individual courses with a grade of "F" for lack of academic progress or for conduct deemed to be contrary to the professional or ethical standards of a field.

At such times as the student fails to meet acceptable standards of academic performance or has engaged in professional misconduct, the student may be dismissed, suspended or expelled from the University at the discretion of the Dean of the Neeley School.

If a student is dismissed, suspended, or expelled from the University, a grade of "F" or a designation of "Q" will be recorded for each course in progress as determined by the appropriate academic dean.

### Miscellaneous Academic Policies

Academic probation describes the status of a graduate student who is experiencing academic difficulties and must change this status during the next semester of enrollment (fall or spring) at TCU. Academic dismissal describes the action taken by the Neeley School in the case where a student has failed to meet the minimum academic standards of the faculty. Dismissal from the MBA, or MIM Program is permanent; a dismissed student will not be permitted to enroll for graduate credit at a later date.

Other academic policies pertaining to graduate students:

1. Graduate students on academic probation will not be permitted to enroll in the Educational Investment Fund.
2. Graduate students on academic probation will not receive a graduate assistantship or scholarship except under extraordinary circumstances. Reinstatement of a financial aid award after the probationary period is not guaranteed.
3. In computing a graduate student's grade index, only the most recent grade will be counted for courses that are repeated for credit.
4. Grades for non-TCU transfer courses will *not* be included in computing a graduate student's grade index.
5. No 50000-level course may be taken for credit at TCU by an MBA student unless approved on an exception basis by the MBA Academic Program Director.
6. Students who are admitted conditionally must satisfy their condition(s) during the first semester of enrollment or face dismissal.
7. Each academic year, a series of industry-led seminars will be offered for MBA students. All first year daytime students are required to attend a specified number of seminars during their first year. Evening students will be required to attend the same total number of seminars as the day students over the first and second years. Participation in the prescribed number of seminars is a prerequisite for enrolling in the second year of the Day Program or the third year of the Evening Program.
8. All MBA students are required to complete the MBA START Workshop prior to commencing graduate studies.
9. An MBA student may enroll for a maximum of three (3) hours of independent study credit in one department. (Typically, these courses carry the 70970 number.) No more than a total of six (6) hours can be taken in independent study courses. MAc students may enroll for a maximum of three (3) hours of credit (in total) in

independent study courses. Graduate students on academic probation will not be permitted to enroll in independent study courses.

## **Graduation**

At the beginning of the semester in which the student plans to graduate, he or she must submit an Intent to Graduate form to the Neeley School Graduate Programs Office. Graduation requires a minimum of 2.75 cumulative grade point average. Students who do not have a 2.75 average after completing the program have a maximum of two semesters to raise their average to this standard.

MBA students are expected to complete all requirements within five years. MAc students are expected to complete all requirements within two years. Extension of time must be applied for in writing to the MBA Academic Program Director or Accounting Department Chair. Additional courses may be assigned to students who do not complete the degree within the time limit.

## **Admissions**

### **Admissions Philosophy**

#### **MBA**

The nature of the Neeley School MBA program requires that a holistic approach be used in the admissions process. No single criterion, such as a test score, can determine eligibility for admission. Not only must applicants demonstrate academic ability, but also the ability to perform in a highly interactive, team-based environment. Previous academic records, relevant test scores, professional work experience, motivation, maturity and demonstrated leadership are all considered in the admissions decision.

Except under extraordinary circumstances, students applying to the MBA program must have or expect to earn a bachelor's degree from an accredited college or university prior to enrollment.

Application materials may be sent to the Neeley School as they are completed. It is not necessary to hold materials to send as a single package. Although our staff will make every effort to update applicants on the status of their materials received to date, it is the applicant's responsibility to ensure that all materials are received. Applicants may wish to contact the Neeley Graduate Programs Office to verify their application status as admission deadlines approach.

#### **MAc**

Admission to the MAc Program is open to anyone who has or expects to earn a bachelor's degree from an accredited college or university. While a BBA in accounting is not a prerequisite for admission, applicants must have completed the equivalent of 24 semester hours of accounting, including those courses (or their equivalents) required for the TCU BBA accounting degree. See the *TCU Undergraduate Studies Bulletin* for details.

There is no single formula for admission to the MAc Program. Admission is competitive and seeks excellence. Ideal applicants will have high academic potential and achievement as well as strong motivation and leadership potential. These qualities are assessed through the candidate's GMAT score, grade point average, and letters of recommendation. Significant work experience, while not a prerequisite for admission to the Neeley School MAc Program, is a factor that can favorably affect an applicant's prospects for admission. Hence, an individualized approach is followed in which a variety of information is requested to develop a profile of each applicant.

Students in the TCU BBA accounting program are encouraged to apply for admission to the MAc program in the spring semester of their *junior* year. TCU has adopted a "rolling" admissions policy whereby an application is generally reviewed as soon as it is complete. An applicant would thus be well-advised to apply early to the program.

### **Admission Application Checklist**

An application will not be considered by the Graduate Admissions Committee until all of the following materials are received:

1. Completed application form and essays
  2. An official transcript from each college or university previously attended
  3. Three letters of recommendation
  4. Application fee of \$50 (Make check or money order payable to TCU. Please do not send cash.)
  5. Official GMAT scores
  6. Official TOEFL scores (non-native English speakers only)
  7. Personal interview (strongly recommended but not required)
- Typically, applications are reviewed and admissions decisions announced within three to four weeks following receipt of the completed admission application packet.

### **Graduate Management Admission Test (GMAT)**

The GMAT is required of all applicants. The test is administered by the Educational Testing Service. Questions regarding the test, test procedures, test sites, etc., should be addressed to:

Educational Testing Service  
P.O. Box 6103  
Princeton, NJ 08541-6103  
U.S.A.  
Phone: (609) 771-7730.  
[www.mba.com](http://www.mba.com)

Score reports must be sent to the Neeley Graduate Programs Office directly from the Educational Testing Service. Applicants who did not list TCU as a score recipient at the time they took the test should contact the Educational Testing Service directly to request that scores be sent to TCU. TCU's code is 6820.

### **Test of English as a Foreign Language (TOEFL)**

Applicants whose native language is not English must submit official TOEFL scores as a part of their application. This requirement is waived for citizens of other countries holding degrees from colleges or universities located in the United States.

The TOEFL is administered by the Educational Testing Service. Test schedules and registration information are available through the TCU MBA Office. Any additional questions regarding the test, test procedures, test sites, etc., should be addressed to:

TOEFL/TSE Services  
Educational Testing Service  
P.O. Box 6151  
Princeton, NJ 08541-6151  
U.S.A.  
Phone: (609) 771-7100.  
[www.toefl.org](http://www.toefl.org)

Score reports must be sent to the Neeley Graduate Programs Office directly from the Educational Testing Service. Applicants who did not list TCU as a score recipient at the time they took the test should contact the Educational Testing Service directly to request that scores be sent to TCU. TCU's code is 6820.

### **Admission Deadlines and Decisions**

#### **MBA**

Students are admitted to the MBA program in the fall semester only. Due to the limited size of the program, candidates are encouraged to apply early. Applications are received as early as a year prior to admission.

•**March 15-Priority consideration deadline for scholarships.** After March 15, scholarships will be awarded only as funds allow.

•**April 30-General application deadline.** After April 30, applications are accepted on a space-available basis.

#### **MAc**

Students may apply to begin in the fall, spring, or summer semester.

•**April 15-General application deadline for fall enrollment.**

•**October 15-General application deadline for spring enrollment.**

After these dates, applications are accepted on a space-available basis.

Prospective students are urged to apply well in advance of application deadlines. The deadlines above apply to all required application materials, including GMAT scores. International applicants are also required to submit TOEFL scores and encouraged to submit essay scores.

For additional admissions information  
Neeley Graduate Programs Office Office  
P.O. Box 298540  
Fort Worth, Texas 76129  
Phone: (817) 257-7531 or  
1-800-828-3764, ext. 7531  
Fax: (817) 257-6431  
E-mail: [mbainfo@tcu.edu](mailto:mbainfo@tcu.edu)  
[www.mba.tcu.edu](http://www.mba.tcu.edu)

### **Financial Aid**

#### **Merit-Based Awards**

The Neeley School has an aggressive scholarship program for MBA and MAc students. Approximately 65-70 percent of our full-time MBA students attend TCU on merit-based awards funded by the University or our corporate partners. Awards based on the merits of the applicant's academic and professional credentials are available for qualified students from any country.

As with the admission decision, many factors are considered for merit-based awards. Prior academic performance, relevant test scores, professional work experience, motivation, maturity and leadership ability are all considered. Decisions for merit-based awards are made on the basis of the information provided in the admissions application. No other application is necessary.

Applications received by **March 15** will be given priority consideration for merit-based awards. Applications received after that date will be considered for these awards as resources remain available.

**For additional information on merit-based awards:**

Neeley Graduate Programs Office  
P.O. Box 298540  
Fort Worth, Texas 76129  
Phone: (817) 257-7531 or  
1-800-828-3764, ext. 7531  
Fax: (817) 257-6431  
E-mail: mbainfo@tcu.edu  
Internet Web Site: www.mba.tcu.edu

### Financial Need-Based Awards

Numerous awards based on financial need are available for full-time and evening students, including student loans, grants and college work/study awards. Many of these awards are subsidized by the federal government and therefore are available to U.S. citizens or permanent residents only.

To apply for need-based aid, applicants should complete the Free Application for Federal Student Aid (FAFSA) available at [www.fafsa.ed.gov](http://www.fafsa.ed.gov). The FAFSA should be completed as soon as the required tax information is available. The FAFSA is processed by the U.S. federal government and that processing will take from two to four weeks before your results will be available to TCU or any other university.

### For additional information on need-based awards:

Office of Scholarships and Student Financial Aid  
P.O. Box 297012  
Fort Worth, Texas 76129  
Phone: (817) 257-7858  
[www.fam.tcu.edu](http://www.fam.tcu.edu)

### Courses of Instruction

#### Accounting

**ACCT 60013 Financial Reporting.** A study of the fundamental concepts of financial accounting and reporting by business entities in accordance with generally accepted accounting principles. The course approaches the material from the perspective of the financial statement user rather than the financial statement preparer. Therefore, emphasis is placed on the use and interpretation of information contained in business financial statements by managers, investors, and creditors.

**ACCT 60023 Accounting for Managerial Planning and Control.** Prerequisite: DESC 60013 and ACCT 60013. A study of the basic concepts, measures, techniques, and approaches of managerial accounting. The emphasis is on understanding and developing accounting and economic concepts for decision making within profit-making and not-for-profit organizations related to such topics as short-term and long-term planning, performance measurement, transfer pricing, and traditional and contemporary product costing systems. The application of the basic concepts and approaches to small and large-sized domestic and global organizations is emphasized. Where appropriate, contemporary managerial accounting issues are stressed.

**ACCT 65013 Financial Reporting and Analysis.** A study of the fundamental concepts of financial accounting and reporting by business entities in accordance with generally accepted accounting principles. The course approaches the material from the perspective of the financial statement user rather than the financial statement preparer. Therefore, emphasis is placed on the use and interpretation of information contained in business financial statements by managers, investors, and creditors.

**ACCT 65023 Accounting for Managerial Planning and Control.** Prerequisite: DESC 60013 and ACCT 60013. A study of the basic concepts, measures, techniques, and approaches of managerial accounting. The emphasis is on understanding and developing accounting and economic concepts for decision making within profit-making and not-for-profit organizations related to such topics as short-term and long-term planning, performance measurement, transfer pricing, and traditional and contemporary product costing systems. The application of the basic concepts and approaches to small and large-sized domestic and global organizations is emphasized. Where appropriate, contemporary managerial accounting issues are stressed.

**ACCT 70003 Business Law Accounting Professionals.** Prerequisite: Enrollment in MAC program or instructor permission. An overview of business law relevant to the practice of public accounting, including: contracts, business organizations, debtor-creditor relationships, government regulation of business, property, negligence, fraud, and the Uniform Commercial Code.

**ACCT 70053 Contemporary Accounting Issues.** Prerequisite: Enrollment in MAC program or instructor permission. Study of various aspects of accounting theory and applications. Normally, topics include theoretical frameworks, alternative models, regulation, rule development, and the demand for accounting information.

**ACCT 70153 Financial Statement Analysis.** 3 semester hours. Prerequisite: Enrollment in the MBA or MAC program or instructor permission. The analysis and use of information contained in corporate financial statements by equity and credit analysts, management, and auditors, including an understanding of the limitations and inadequacies of published financial statements.

**ACCT 70273 Auditing.** Prerequisite: Enrollment in MAC program or instructor permission. Auditing theory, practice, and procedure as applied to the problems of typical financial audits, special investigations, and review services. Review of ethical and legal responsibilities of professional accountants, and some consideration of relationships with clients, working papers, and preparation of audit and audit-related reports.

**ACCT 70303 Advanced Federal Taxation.** Prerequisite: Enrollment in MAC program or instructor permission. An



overview of the fundamental concepts of the federal tax system that apply primarily to corporations, partnerships, estates, and trusts, with an emphasis on identification of tax issues, tax planning, and tax research.

**ACCT 70970 Special Problems in Accounting.** Special problems in Accounting.

### **Business Administration**

**BUAD 75973 Global Environment of Business.** This course is the study and experience of international business. The course provides background learning in preparation for the international trip. The international trip will be to England and Germany with company visits and international guest lectures. A project based on experiences and observations is due at the end of the course.

**BUAD 77702 International Internship.** Prerequisite: Enrollment in the MIM program. This is an international internship that exposes students to cross-country variations in business practices, cultures, work environments, regulatory settings, and other aspects of international business. Students are immersed in a work environment different from that of their native country. MIM students from TCU will intern in Mexican companies while MIM students from UDLA will intern in U.S. companies.

### **Decision Sciences**

**DESC 60013 Data Analysis for Managerial Decisions.** Examines statistical and analytical techniques to analyze data for effective managerial decisions. Deals with applications from business and industry. Topics include description and summarization of data, exploratory data analysis, testing hypothesis, analysis of variance, regression analysis and forecasting, and fundamentals of decision theory.

**DESC 60023 Manufacturing and Services Operations Management.** Prerequisite: ACCT 60013, MANA 60003 and DESC 60013. Develops concepts and analytical skills to address the issues related to the creation and distribution of goods and services. Emphasizes the role of operations function as a competitive weapon and examines how operations strategy can be integrated with the corporate strategy and other functional strategies. Discusses the increasingly important role of global competition, technology, and total quality. Other topics include process design, capacity planning, technology choice, planning and inventory control, and just-in-time systems. Technology is emphasized.

**DESC 65013 Data Analysis for Managerial Decisions.** Examines statistical and analytical techniques to analyze data for effective managerial decisions. Deals with applications from business and industry. Topics include description and summarization of data, exploratory data analysis, testing hypothesis, analysis of variance, regression analysis and forecasting, and fundamentals of decision theory.

**DESC 65023 Operations Management.** This course develops concepts and analytical skills to address the issues related to the creation and distribution of goods and services. It emphasizes the role of operations function as a competitive weapon and examines how operations strategy can be integrated with the corporate strategy and other functional strategies. It discusses the increasingly important role of global competition, technology, and total quality. Other topics include process design, capacity planning, technology choice, planning and inventory control, and just-in-time systems. Technology is emphasized.

**DESC 70413 Total Quality Management.** Prerequisite: DESC 60013 or equivalent. Total Quality Management TQM includes the study of different quality philosophies espoused by Deming, Juran, and Crosby. Case studies in quality applied to various industries are examined as well as statistical process control charts, pareto analysis, and other statistical techniques necessary to implement TQM effectively.

**DESC 70420 Regression Analysis.** Prerequisite: DESC 60013. This course serves as a 1.5 hour MBA elective. Presents the basic theory of simple and multiple linear regression analysis with applications to business and economic data. Discusses analysis of both cross-sectional data and time-series data. Topics include statistical inference, limitations of regression models, violations of assumptions, use of indicator variables, and variable selection. Extensive use of computer software. Applications to real business and economic data. Analysis of variance and logistic regression will be covered if time allows.

**DESC 70430 Supply Chain Operations Management.** An in-depth study of the theory and practice of supply chain management function in manufacturing and service industries. Supply chain management is the integration of the activities associated with the flow and transformation of goods from the raw materials stage through to the end user, to achieve a sustainable competitive advantage. This course provides insights into the conceptual foundations and facilitates an understanding of the strategic concepts and tools necessary for meeting the challenges in the management of supply chains. Topics include management of logistics networks, material flows and the role of information systems technology. (1.5 credit hours)

**DESC 70520 Time Series Forecasting.** Prerequisite: DESC 60013. This course serves as a 1.5 hour MBA elective. Presents extrapolative time-series forecasting techniques with applications to business and economic data. Techniques discussed include moving averages, decomposition, exponential smoothing and ARIMA models. Provides an understanding of the limitations of forecasting models and the pitfalls involved in their use. Qualitative forecasting is also discussed. Extensive use of computer software for time series forecasting. Applications to real business and economic data.

**DESC 70970 Special Problems in Decision Science.**

### **Finance**

**FINA 60003 Economic Environment of Business.** A contemporary, real-world course focusing on the economic environment within which today's businesses operate taught from the perspective of the practicing manager. Content is both national and international in flavor. Highlights include study of the general economy, market structure and public policy, economic analysis of industries and business cycles, and economics of the firm. International comparative advantage is stressed. The course is taught through the use of materials, tools, and databases readily available to the manager.

**FINA 60013 Management of Financial Resources.** Prerequisite: ACCT 60012, ACCT 60013, DESC 60013 (or concurrent enrollment in DESC 60013) and MANA 60003. A study of the acquisition and management of the financial resources of the firm. The emphasis is on developing and understanding decision making concepts related to such topics as valuation, cost of capital, capital budgeting, dividend policy, debt policy, and corporate control. The interaction between investment and financing decisions in the marketplace is emphasized in the context of risk-return considerations, and the obligation of management to security holders is considered. Where appropriate, the global environment of decisions is stressed.

**FINA 65003 Economic Environment for Business.** A contemporary, real-world course focusing on the economic environment within which today's businesses operate taught from the perspective of the practicing manager. Content is both national and international in flavor. Highlights include study of the general economy, market structure and public policy, economic analysis of industries and business cycles, and economics of the firm. International comparative advantage is stressed. The course is taught through the use of materials, tools, and databases readily available to the manager.

**FINA 65013 Management of Financial Resources.** Prerequisite: ACCT 60013, DESC 60013 and MANA 60003. A study of the acquisition and management of the financial resources of the firm. The emphasis is on developing and understanding decision making concepts related to such topics as valuation, cost of capital, capital budgeting, dividend policy, hedging financial exposure, and corporate control. The interaction between investment and financing decisions in the marketplace is emphasized in the context of risk-return considerations, and the obligation of management to security holders is considered. Where appropriate, the global environment of decisions is stressed.

**FINA 70183 Educational Investment Fund.** Prerequisite: FINA 60013 or FINA 70513. Admission by approval of the Dean of the Neeley School. Participation in the operation of the Educational Investment Fund student managed investment portfolio. Students participating in the Educational Investment Fund are strongly encouraged to take six (6) additional hours of finance electives beyond the program requirements (with possible exception made in the case of extensive finance background).

**FINA 70193 Educational Investment Fund.** Prerequisite: FINA 60013 or FINA 70513. Admission by approval of the Dean of the Neeley School. Participation in the operation of the Educational Investment Fund student managed investment portfolio. Students participating in the Educational Investment Fund are strongly encouraged to take six (6) additional hours of finance electives beyond the program requirements (with possible exception made in the case of extensive finance background).

**FINA 70420 Options and Futures Markets.** 1.5 Hours. Prerequisite: FINA 60013. Introduction to derivatives - financial contracts that "derive" value from other instruments or prices. An in-depth study of the valuation of derivatives. Valuation techniques include methods such as binomials and Black-Scholes models.

**FINA 70470 Real Estate Finance.** (1.5 credit hours) Prerequisite: FINA 60013. An examination of mortgage markets and instruments, including an introduction to basic real estate law, mortgage calculations, loan underwriting, primary and secondary mortgage markets, and securitization.

**FINA 70503 Management of Financial Institutions.** Considers the application of management principles and techniques to the specialized problems encountered by commercial banks and other financial institutions. Topics include lending, portfolio management, funds acquisition and capital management. Cases involving commercial banks, insurance companies, investment banking firms and other institutions are used.

**FINA 70513 Security Analysis.** Prerequisite: FINA 60013 or graduate standing in economics. Theory of security selection focusing on its economic, financial and accounting aspects. Some attention directed to the role of technical analysis as an adjunct to the more traditional fundamentalist approach. Critical review of significant investment literature is included along with consideration of the Chartered Financial Analyst C.F.A. program and its professional objectives.

**FINA 70520 Risk Management and Financial Engineering.** 1.5 Hours. Prerequisite: FINA 70420. Study of current usage of derivative instruments in financial engineering. Financial engineering is the science of managing financial risk exposure through derivatives, as well as the construction of new financial products, such as SWAPS. Topics include corporate risk management, hedge fund strategies, and operation of derivative markets.

**FINA 70533 Portfolio Management.** Prerequisite: FINA 60013. A 'state-of-the-art' examination of the theory and practice of portfolio management. Current literature in leading journals introduces topics such as contemporary techniques of risk-return management, setting portfolio objectives and measuring performance and portfolio selection and revision. Consideration is given to the special problems encountered in management of institutional portfolios.

**FINA 70543 Advanced Financial Management.** Prerequisite: FINA 60013. Applications of theory of corporate finance to real-world problems through case studies. Topics include financial analysis and planning, forecasting the financial needs of a firm, capital expenditure analysis, capital structure and distribution policies, merger and acquisition analysis, corporate restructuring, and risk management. Emphasis is placed on the effects of the firm's financial and operating decisions on the value of the firm's securities in financial markets.

**FINA 70553 Money and Capital Markets.** Prerequisite: FINA 60013. An examination of underlying forces in the markets for short-term and long-term funds. Topics include the role of financial institutions in liquidity adjustment and allocation of funds, the determination of the level and structure of interest rates and the relationship between U.S. and international financial markets and economic activity. Policy issues are explored.

**FINA 70563 International Finance.** Prerequisite: FINA 60013. Financial management of the firm in an international context. The basis of international trade, the management of currency and interest rate risks, international investment decisions, international money and capital markets, financial policy decisions in an international setting. Development of theory via lectures and applications via case analyses.

**FINA 70570 Real Estate Investment Analysis.** (1.5 credit hours) Prerequisites: FINA 60013 and FINA 70470.

A study of the analytical tools and decision-making processes necessary to maximize returns from investment in commercial, industrial and residential income producing real estate. Investment analysis, optimal financial management and portfolio selection of real estate under institutional constraints and in the complex tax environment are considered.

**FINA 70970 Special Problems in Finance.** Special problems in Finance.

**FINA 75543 Advanced Financial Management.** Prerequisite: FINA 60013. Applications of theory of corporate finance to real-world problems through case studies. Topics include financial analysis and planning, forecasting the financial needs of a firm, capital expenditure analysis, capital structure and distribution policies, merger and acquisition analysis, corporate restructuring, and risk management. Emphasis is placed on the effects of the firm's financial and operating decisions on the value of the firm's securities in financial markets.

## Management

**MANA 60003 Business Strategy and Structure.** An introduction to business strategy and organization structure. The course presents basic strategic management concepts including industry analysis and competitive positioning, building sustainable competitive advantage, and competitor analysis. Linkages between strategy and structure are examined in the context of organization design. Interfunctional and interorganizational issues are explored and ethical considerations are addressed. Technology and communication skills are emphasized.

**MANA 60023 Legal and Social Environment of Business.** Corporations operate within an environment that is comprised of relationships with customers, investors, employees, competitors, and suppliers. The primary focus of this course will be to examine those federal and state laws that regulate these relationships. Appropriate attention will be paid to the various social, ethical, and political forces that influence the development and enforcement of laws. Additionally, the course will highlight aspects of the international legal environment of business.

**MANA 60033 Managing People.** An introduction to leadership concepts and behavioral skills which are used to develop a managerial perspective for organizational problem-solving. General topics include motivation, individual performance, reward systems, leadership, communication, listening, teams, organization cultures, and managing change. Written and oral communication skills are emphasized.

**MANA 60043 Managing Information Technology.** Prerequisite: MANA 60003. An investigation of information technology as a facilitator of organizational strategy and business process redesign. The role of information in the evaluation and control of corporate uncertainty at the organizational and interorganizational level is examined. Particular emphasis is placed on the successful design, implementation, and use of information technologies in both national and international organizations. Technology is emphasized.

**MANA 60063 Strategic Management in a Global Environment.** Prerequisite: Must be taken during the last semester the course is offered prior to graduation, after completion of all required courses. A final integrative course in contemporary global strategic management that integrates the basic business functions. Comprehensive cases deal with global competition in complex changing environments within which the organization seeks to achieve a sustainable competitive advantage. Issues of strategy formulation and implementation are addressed. Technology and communication skills are emphasized.

**MANA 65003 Business Strategy and Structure.** An introduction to business strategy and organization structure. The course presents basic strategic management concepts including industry analysis and competitive positioning, building sustainable competitive advantage, and competitor analysis. Linkages between strategy and structure are examined in the context of organization design. Interfunctional and interorganizational issues are explored and ethical considerations are addressed. Technology and communication skills are emphasized.

**MANA 65023 Legal and Social Environment of Business.** Corporations operate within an environment that is comprised of relationships with customers, investors, employees, competitors, and suppliers. The primary focus of this course is to examine those federal and state laws that regulate these relationships. Appropriate attention is paid to the various social, ethical, and political forces that influence the development and enforcement of laws. Additionally, the course highlights aspects of the international legal environment of business.

**MANA 65033 Building High Performance Work Systems.** High performing organizations gain competitive advantage by putting people first. This course examines via case study discussion and readings how these performance, people-centered organizations focus on: aligning people management with strategy, selective staffing, training as investment, building effective teams, sharing information, and designing effective reward systems.

**MANA 65043 Electronic Business.** Electronic business examines the impacts of internet, extranets and intranets on the corporate environment. Web based business models, electronic payment systems, supply chain management, marketing, legal, security and international issues will be investigated. Overview of E-Business technology and software applications and trends is explored.

**MANA 65063 Strategic Management in a Global Environment.** This final course in contemporary global strategic management integrates the basic business functions. Comprehensive cases deal with global competition in complex changing environments within which the organization seeks to achieve a sustainable competitive advantage. Issues of strategy formulation and implementation are addressed. Technology and communication skills are emphasized.

**MANA 70163 Leadership Development.** Prerequisites: MANA 60003, 60023, 60033, ACCT 60023, DESC 60023, FINA 60013, MARK 60013 and permission of the instructor. Integration of business school skills developed in the classroom with the problem-solving requirements of modern business. Participants work in teams assigned to off-campus, real business problems. Full responsibility is assigned to the students who must demonstrate leadership ability and skill in developing and presenting solutions.

**MANA 70460 Managing Business Ethics.** 1.5 credit hours. This course addresses moral reasoning and decision making in a business context. Tools for addressing ethical dilemmas are addressed from a personal, managerial, and

organizational framework. Case studies are used to develop moral reasoning skills.

**MANA 70503 Entrepreneurship.** Prerequisite: MANA 60033. An introduction to the skills, concepts, attitudes, and knowledge relevant to creating and managing entrepreneurial ventures. Examines the nature of the entrepreneur and the entrepreneurial process, the driving forces behind the process, the screening and evaluation of new venture ideas and business opportunities, the utilization of available resources, and the development of successful business plans.

**MANA 70603 Human Resource Management.** Prerequisite: MANA 60033. The study of programs and activities pertaining to personnel management systems. Major topics include fair employment practices, job analysis, human resource planning, performance appraisal, selection and staffing and training and development.

**MANA 70613 Negotiations.** Prerequisite: MANA 60033. Study of distributive, integrative/principled, and intraorganizational negotiations. Includes coverage of negotiation strategies, tactics, preparation, social structure, ethics, and international negotiations. Errors and breakdowns are also covered along with other conflict resolution techniques such as mediation and arbitration.

**MANA 70623 Law and Business in the European Union.** Beginning in 1957 with the signing of the Treaty of Rome, six European countries established a European Economic Community (now Union) whose goal was the elimination of all barriers to the free movement of goods, services, workers, and capital. The European Union, now comprised of 15 countries, is the largest and most integrated regional trading block in the world. This course examines the legal order of the European Union and examines the multitude of ways it affects companies who wish to do business with its citizens.

**MANA 70633 Interpersonal Relations.** Prerequisite: MANA 60033. Cognitive and experiential approaches are combined to facilitate understanding of issues which affect interpersonal relations. Primary objective is the development of interpersonal competencies in both one-to-one and group decision-making situations.

**MANA 70760 Transformational Leadership.** 1.5 credit hours. Prerequisite: MBA student or permission of instructor. This course is designed to give students an understanding of leadership processes that underlie the survival, effective functioning and self-determination of organizations in the 21st century. To this end, we will examine a number of relevant topics that reflect the nature of the challenge being faced, key people and organizational issues in meeting this leadership challenge, and how organizations can select, nurture and develop future leaders.

**MANA 70773 Emerging Information Technologies for Decision Support.** Managerial perspective of emerging information technologies for problem solving and decision making. Examination of decision factors that must be considered when using decision support technologies are examined. Formulation, development and evaluation of decision support systems, expert systems, neural networks, hypermedia, user interface designs are discussed. Hands-on use of decision support technologies and field trips.

**MANA 70780 Management Consulting.** 1.5 credit hours. Prerequisite: MANA 60033. This course will examine critical issues associated with effective management consultation. Topics will include clarifying the role and types of management consultation, developing a sound understanding of the consultation processes, and identifying key capabilities associated with effective consultation. In addition, this course will explore consulting from the perspective of external consultants (both boutique and large consulting firms) and internal consultants (e.g., who tend to work for large corporations). Finally, we will address key business issues for independent consultants and the factors needed to create, grow and sustain a successful consulting business.

**MANA 70970 Special Problems in Management.** Special problems in Management.

**MANA 75163 Transformational Leadership.** This course is designed to give the student an understanding of leadership processes that underlie the survival, effective functioning and self-determination of organizations in the 21st century. To this end, the class examines a number of relevant issues that reflect both the "being and doing" of leadership. The focus is on leading from senior positions, and in particular, on leading change in a corporate context. The class covers topics that reflect the nature of the challenge being faced, how leaders approach those challenges, and key people and organizational issues that help meet them. The participants explore how organizations can nurture and develop future leaders.

**MANA 75613 Negotiations.** Study of distributive, integrative/principles, and intraorganizational negotiations. Includes coverage of negotiation strategies, tactics, preparation, social structure, ethics, and international negotiations. Errors and breakdowns are also covered along with other conflict resolution techniques such as mediation and arbitration.

**MANA 75983 Entrepreneurship.** This course is the study of entrepreneurial ventures. The focus is on the origination of high growth; high potential ventures, which can obtain venture capital financing. The course will examine both the theoretical and practical background of such ventures. The culmination of the students' efforts being a business plan for such a venture.

## Marketing

**MARK 60013 Market-Driven Strategy.** Prerequisites: ACCT 60013, DESC 60013, and MANA 60003. Examines the roles of marketing processes in identifying potential customers and their needs, selecting and analyzing market targets, and establishing and maintaining customer relationships. Topics addressed include product planning, distribution, pricing, and promotion strategies designed to produce customer satisfaction. Communication skills are enhanced by written and/or oral presentation assignments.

**MARK 65013 Advanced Marketing Management.** This is an examination of the marketing function and how it relates to value creation, strategic corporate management and marketing decisions; the major phenomena underlying marketing strategy formulation and the component divisions of product planning, communication and channels of distribution, both theory and cases to develop a managerial perspective of marketing; linking marketing strategy to financial value.

**MARK 70100 Promotion Management.** 1.5 credit hours. Prerequisite: MARK 60013 and DESC 60013. The purpose of this course is to teach the student the fundamentals in devising a promotional strategy. The course addresses the basic knowledge a manager needs to understand, plan, execute, and evaluate promotion programs. It treats the promotion process as an integrated set of activities including Advertising, Personal Selling, Sales Promotion, Publicity, and Packaging.

**MARK 70600 Concepts in Supply Chain Management.** 1.5 credit hours. Prerequisites: MARK 60013. Effective Supply Chain Management (SCM) has become increasingly important to businesses. This course will provide the foundation for the concentration in SCM and an overview of the major concepts associated with it. Topics include logistics, transportation, procurement, demand forecasting, supply chain operations, information technology and global SCM.

**MARK 70610 Logistics and Transportation.** 1.5 credit hours. Prerequisites: MARK 60013. Logistics is a core business process that facilitates the creation of value for the external customer and helps to integrate the other functions and processes within the firm. Logistics is defined as that part of the supply chain process that plans, implements, and controls the efficient, effective forward and reverse flow and storage of goods, services, and related information between the point of origin and the point of consumption in order to meet customers' requirements. This course will cover many aspects of business logistics, including materials management, physical distribution, customer service, order processing, information flows, transportation, warehousing and inventory management.

**MARK 70620 Supply Chain Information Tools and Technologies.** 1.5 credit hours. Prerequisites: MARK 60013. Effective supply chain management is heavily dependent on integration of state-of-the-art information tools and technologies. This course will provide an understanding of supply chain models and practical tools for effective decision making and integrated supply chain management (for example ABC segmentation, demand forecasting and planning, inventory management, distribution management and multi-plant coordination). The emphasis will be on exploring tools and off-the-shelf software packages that have been proven effective in many industries, and on identifying and understanding implementation issues associated with the use of such tools.

**MARK 70630 Demand Forecasting Management.** 1.5 credit hours. Prerequisites: MARK 60013. Demand forecasting is one of the key functions of any business enterprise. It drives decisions in every facet of business operations. This course will provide an overview of the techniques, systems, and management approaches used to develop demand forecasts and sales plans. Performance measurement and special cases of forecasting will also be covered.

**MARK 70640 Global Supply Chain Management.** 1.5 credit hours. Prerequisites: MARK 60013. This course will deal with (a) the diversity and complexity to be understood and managed in the globalization of supply chain activities, (b) unique characteristics of the global transportation (ocean shipping, intermodal, and air) system, (c) legal and regulatory issues impacting global supply chain decisions, (d) import and export processes, (e) documentation requirements, and (f) challenges and integration issues with global supply chain management.

**MARK 70650 Strategic Sourcing and Procurement.** 1.5 credit hours. Prerequisites: MARK 60013. This course focuses on the key issues related to the strategic implications of sourcing of products, the purchasing of goods and services, and the role of purchasing in a supply chain context. Provides students with an understanding of purchasing processes, issues, and best practices. Emphasis areas include supplier quality, relationship management, and global sourcing.

**MARK 70660 Supply and Value Chain Strategy.** 1.5 credit hours. Prerequisites: MARK 60013, 70600. This course is designed to be the capstone course for the MBA with a concentration in Supply Chain Management. It will help the students integrate all the elements of supply chain management, and examine how they might be applied to achieve strategic advantage for the firm. The course will use a combination of readings on supply chain strategy and case analysis.

**MARK 70700 Sales Strategy and Organization.** 1.5 credit hours. Prerequisite: MARK 60013. Students are introduced to issues in planning and organizing a sales force. Planning the sales force involves integrating sales strategy with overall promotion and marketing strategy, developing appropriate implementation methods, and developing proper control mechanisms. Organizing a sales force includes developing a selling mix and managing human and capital resources.

**MARK 70710 Managing the Selling Effort.** 1.5 credit hours. Prerequisite: MARK 60013. This course is a continuation of MARK 70700. It focuses on managing the human and capital resources necessary to effectively accomplish selling goals. Specific topics include motivating, training, selecting, compensating, and evaluating salespeople.

**MARK 70720 Planning and Launching Successful New Products.** 1.5 credit hours. Prerequisite: MARK 60013. Study and evaluation of multi-functional processes for planning new products (goods and services). Includes idea generation, concept evaluation, product design and testing, marketing strategy, market introduction, and performance evaluation.

**MARK 70730 Strategies for Building Strong Brands.** 1.5 credit hours. Prerequisite: MARK 60013. Study of brand equity management, brand identification, brand portfolio management, brand leveraging, and related strategic brand management topics. Examines organizing for product management including multi-functional teams and metrics for assessing product and brand performance.

**MARK 70740 Topics in International Marketing.** Prerequisite: MARK 60013. This course serves as a special 1.5 MBA elective in the area of international marketing. The course is designed to give the student a basic perspective of how marketing has evolved beyond domestic marketing and into marketing at a global level. The international marketing course examines the Twenty-first Century - politics, markets, culture, technology, and marketing.

**MARK 70750 International Marketing.** 1.5 credit hours. Prerequisite: MARK 60013. This course introduces the field of international marketing and provides a broad perspective from which to explore and examine various

aspects of what changes when firms compete internationally.

**MARK 70760 Services Marketing.** 1.5 credit hours. Prerequisite: Graduate standing. Examines characteristics of services, the special marketing challenges posed by these characteristics, and marketing strategies unique to public and private, for-profit and non-profit sector service marketing organizations.

**MARK 70770 Marketing Research.** 1.5 credit hours. Prerequisites: MARK 60013 and DESC 60013. Current marketing research techniques. Both quantitative and behavioral research techniques will be explored with an emphasis on application of such techniques to information gathering and problem solving. Market research, as a process, is emphasized.

**MARK 70780 Marketing and the Internet.** 1.5 credit hours. Prerequisite: MARK 60013. The course compares and analyzes Internet marketing strategies for business-to-business and business-to-consumer companies. Marketing relationship building is becoming more important than ever and the use of the Internet is an integral part of any customer relationship program. The potential of the Internet to change marketing communication and distribution has to be exploited.

**MARK 70790 Marketing and Technology.** 1.5 credit hours. Prerequisite: MARK 60013. The course examines how marketing strategies can be developed using current technological innovations. Students will research current literature to learn what technology tools are available and how they might be used in marketing applications.

**MARK 70800 Marketing Strategy.** 1.5 credit hours. Prerequisites: MARK 60013. An examination of current marketing problems and related problem-solving techniques.

**MARK 70970 Special Problems in Marketing.** Special problems in Marketing.

## College of Communication

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### Overview

The College of Communication offers the Master of Arts and a Master of Science in four degree plans. Degree plans include Advertising and Public Relations, Journalism, Media Arts, and Speech Communication. The student who is interested either in continuing into a doctoral program or into professional development will find programs that prepare them for the future. Research and development are balanced with applied experiences in the Communication field. Located in the seventh largest media market in the United States, the graduate programs in the College of Communication at Texas Christian University offer diverse opportunities in a supporting and stimulating environment.

# Media Arts

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[The Graduate Program in Media Arts](#)  
[Combined Bachelor's and Master's Program](#)  
[Gwendolyn P. Tandy Memorial Film Library](#)  
[Graduate Assistantships](#)  
[Prerequisites](#)  
[Graduate Program](#)  
[Courses of Instruction](#)

## Overview

Available on the Master of Arts degree. The program is administered by the Department of Radio-Television-Film.

## The Graduate Program in Media Arts

**The Graduate Program in Media Arts** represents a progressive, integrated approach to the study of media as an *art in an industry of communication*. The graduate program seeks to develop literate scholar-professionals who are well-rounded consumers and practitioners of media. Specifically, the Media Arts masters program produces graduates who have: (1) advanced knowledge about the structure and practices of the media *industries*; (2) increased skills and sophistication about the *production* of content; and (3) the *analytic* ability to communicate how media represent and influence social, cultural, aesthetic, and historical contexts. The program benefits those who will start/continue their professional careers, those interested in expanding their knowledge base about the role, function, and responsibility of the media, and those who will seek to educate others as teachers and media scholars.

## Combined Bachelor's and Master's Program

A combined Bachelors and Masters program in Media Arts is available allowing a student the opportunity to obtain both a Bachelors degree in Radio-Television-Film and a Master of Arts degree in only five years. Degree plans and suggested courses to take each year are available on request. Students may apply to the MEDA program at any time before the second semester of their junior year. Academic progress is evaluated after the first semester of their junior year. Students admitted to the Media Arts program will begin taking MEDA courses their senior year. At the end of their senior year, students will have completed the 124 hours for their undergraduate degree with up to 20 hours going toward their Master of Arts degree. They will complete the M.A. in their academic fifth year. Students must meet all other requirements for admission into the program.

## Gwendolyn P. Tandy Memorial Film Library

A primary research resource is the Gwendolyn P. Tandy Memorial Film Library, housed in the Department of Radio-Television-Film. Rapidly becoming one of the outstanding collections of its kind in the nation, the library is comprised of over 10,000 films and television programs in all formats (video, DVD, laserdisc, 16 MM), representing virtually every major national cinema and narrative genre. Excellent facilities for close analysis of these texts, including an auditorium equipped with state-of-the-art video and film projection systems, are available for graduate student research. In addition, the library contains basic reference works in film and television history, theory and criticism and a collection of master scene scripts. The library also subscribes to over 100 academic and professional journals.

## Graduate Assistantships

The Graduate Program in Media Arts has a number of graduate assistantships available. These awards, which provide remission for tuition or remission for tuition plus a stipend, are typically made for a full academic year.

## Prerequisites

In addition to the minimum requirements for admission as established by the University, the Graduate Program in Media Arts requires completion of an undergraduate degree in Radio-Television-Film or a media-related program. The Department of Radio-TV-Film will consider applications from qualified students who have a Bachelor's degree in other areas and possess substantial professional experience in media as determined by the Media Arts graduate faculty. An applicant who does not meet the admission requirements will have to take up to 24 semester hours of undergraduate courses in the Department of Radio-TV-Film that will not count toward the graduate degree. The number of hours and specific courses needed to make up deficiencies will be determined by the MEDA graduate faculty. All applicants must present a writing sample, portfolio, or example of creative work, satisfactory GRE scores, three letters of recommendation from individuals who can attest to their potential for success in graduate work, and a statement of purpose outlining why they want to pursue graduate work in Media Arts.

## Graduate Program

The Master of Arts degree requires 40 hours, including MEDA 60143 and 60513, 18 additional hours of Media Arts courses (6 hours each in the emphasis areas of "industry", "production", and "analysis"), 6 hours of approved graduate courses from other academic units of the University, 6 hours of thesis/project, and 4 one-hour graduate seminars. Students must complete a thesis paper or a production project as approved by a three-member graduate faculty committee. A student electing the thesis option must successfully complete a paper that demonstrates advanced research skills. The student must also satisfactorily pass an oral defense of the thesis. The project will be a creative capstone experience, such as the production of a feature-length screenplay, a documentary, or other project that requires extensive preparation and execution.

## Courses of Instruction

### Core

**MEDA 60143 Theory and Practice of Media Literacy.** Historical and theoretical development of "media literacy"



as a practice of educating the public about the process, techniques, and impact of various media. Focuses on the knowledge base needed to continuously interact with media through understanding of how media work, how they produce meaning, and how they construct reality.

**MEDA 60513 Research Methods in Media Arts and Communication.** Seminar designed to introduce the various methods of media research. Focus on quantitative and qualitative approaches, including surveys, experiments, naturalistic inquiry, critical/cultural, historical and legal research.

#### **Industry**

**MEDA 50113 Producing for Film and Video.** Seminar assesses the role of the producer in the film and video industry. All phases of production will be examined, including budgeting, financing, rights acquisition, and managing the production.

**MEDA 60443 Globalization of the Media Industries.** Examines the increasingly international nature of the media industries. Investigates how films, television programs, music, and interactive media are distributed and marketed globally. Examines the perception that "globalization" equals "Americanization."

**MEDA 60523 Advanced Media Management.** Seminar provides in-depth analysis of four important aspects of media management theory and practice: (1) operations management, (2) decision-making processes, (3) objective evaluation techniques, and (4) communication, language, and persuasive speech.

**MEDA 60903 Advanced Topics: Media Industries Studies.** Seminar offering the opportunity to study various media industries in depth.

#### **Production**

**MEDA 50223 Advanced Videography and Cinematography.** This course examines the theory and practice of Cinematography and Videography. Students will explore advanced methods in image control, and have the opportunity to improve their skills in this hands-on class.

**MEDA 50333 Advanced Techniques in Post-Production.** Examines both hardware and software considerations in the post-production environment, including emerging technologies in the production industry. Includes advanced non-linear editing, and working with the department's Avid system (which includes Adobe After Effects).

**MEDA 50553 The Full-Length Screenplay.** Opportunity to develop, write, and revise a full-length original script. Includes theoretical models of scriptwriting, development of rough scenarios, beat outlines, first drafts, and revisions.

**MEDA 50613 Directing.** This course explores video and film directing on an advanced level. Combines the examination of techniques used by feature film directors. All phases of the directing process are examined from selecting a script, rehearsal, principal photography, and post-production.

#### **Analysis**

**MEDA 60433 Technology and Culture.** Seminar analyzes the ways media technologies have affected and represented their socio-cultural contexts. Course emphasizes the relationship between technological development and ideology.

**MEDA 60503 Script Analysis.** Incorporates theory and criticism to enable students to dissect and critique scripts written for the visual media. Students will develop the ability to analyze the basic structure of screenplay plots and their relation to character, thought, language, sound and spectacle.

**MEDA 60803 Media Industries and the Production of Culture.** Explores the function of media institutions in the generation and circulation of meanings in society. Course addresses general theoretical issues relating to the production of culture, professional ideologies and work practices within media industries, and interaction of media institutions with the socio-political environment. Includes case studies of various media.

**MEDA 60913 Advanced Topics: Media and Culture.** Seminar offering the opportunity for in-depth study of various significant aspects of the relationship between media and culture.

**MEDA 60923 Advanced Topics in Production.** Seminars offering the opportunity to study various significant production topics in depth.

**MEDA 70001 Graduate Seminar.** Seminars that analyze and discuss significant issues and developments in media and communication. Allows both faculty and students to present work, attend guest presentations, collaborate, and prepare thesis project.

**MEDA 70980 Thesis.** Thesis.

**MEDA 70990 Thesis.** Thesis.

# Journalism

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[Master of Science in Journalism: News-Editorial \(non-thesis\)](#)

[Master of Science in Journalism: Advertising/Public Relations \(thesis and non-thesis options\)](#)

[Admission Requirements](#)

[Graduate Assistantships](#)

[Courses of Instruction](#)

## Overview

The Department of Journalism offers two degrees designed primarily for working media professionals: The Master of Science in Journalism: News-Editorial (print, broadcast, and Internet journalists) and the Master of Science in Journalism: Advertising/Public Relations.

### Master of Science in Journalism: News-Editorial (non-thesis)

The Master of Science degree in Journalism: News-Editorial is for those students seeking to broaden their professional and intellectual growth, develop a critical understanding of the institutions, processes, and effects of mass communication while enhancing their skills in print, broadcast and media management. The degree is recommended for media professionals and others seeking a more extensive foundation for work in today's growing media markets.

The degree requires 36 hours, including Proseminar in Journalism and Mass Communication (50123), Research Methods (60113) and Media Ethics (60133); 18 additional hours of Journalism courses; and 9 hours of approved graduate courses from other academic units. A comprehensive examination is required after the completion of course work.

### Master of Science in Journalism: Advertising/Public Relations (thesis and non-thesis options)

The Master of Science in Advertising/Public Relations is designed for practitioners seeking a broader understanding of research techniques, communication theory, ethics and law, as well as those who want to enhance their understanding of nuances in the practice, of advertising/public relations audiences and issues, and the processes and effects of mass and specialized communication.

The program helps students to develop advanced skills and knowledge in problem-solving and in dealing with management issues in a global society, as well as understanding the theoretical underpinnings of communication efforts that build better relationships with an organization's publics.

The degree requires 36 hours, including Proseminar in Journalism and Mass Communication (50123), Research Methods (60113) and Media Ethics (60133); 18 additional hours of Journalism courses; and 9 hours of approved graduate courses from other academic units. There are two tracks, one requiring a project and the other a thesis. The thesis track is for students who plan to pursue a doctorate.

## Admission Requirements

Applicants must meet general University requirements as specified in the graduate catalog, as well as having completed 15 semester hours (five courses) in undergraduate journalism or have substantial professional experience in a mass communication discipline as determined by the journalism graduate faculty. The application must also include:

• An application form.

• Two official transcripts from all colleges or universities you have attended.

• A statement of no more than 250 words describing your academic and/or professional objectives.

• Three letters of recommendation.

• GRE General Test scores.

An applicant who does not meet the admission requirements will have to take up to 15 semester hours of undergraduate journalism or advertising/public relations courses that will not count toward the graduate degree. The number of semester hours needed will be determined by the graduate journalism faculty.

## Graduate Assistantships

Graduate Assistantships are available for students pursuing either the M.S. in news-editorial journalism or the M.S. in advertising/public relations. These assistantships, which provide remission for tuition or remission for tuition plus a stipend, are typically made for a full academic year.

## Courses of Instruction

### Core Courses

**JOUR 50123 Proseminar in Journalism and Mass Communication.** Seminar devoted to the analysis and discussion of significant issues in journalism and mass communication with a focus on related literature, research areas and policy developments.

**JOUR 60113 Research Methods in Journalism and Mass Communication.** Introduction to quantitative and qualitative methodologies used in the study of mass communication, including surveys, content analyses, experimental designs, historical research and case studies.

**JOUR 60133 Media Ethics.** Principles of ethical journalism from the articulated ideals, codes and practice in the field. Examines the moral dilemmas facing media professionals from the approach of thinking through ethical

problems, considering differences of judgment, and evaluating the performance of the media.

### **News-Editorial (Print and Broadcast) Courses**

**JOUR 50163 Issues and Crises in Public Communication.** The course covers the way issues of public concern are detected by news media and by public relations and advertising strategists as the issues develop, and it examines how communication of government policies as well as corporate and non-profit organization's concerns affect perceptions and subsequently public opinion.

**JOUR 50173 International Reporting.** The course will critically analyze the coverage of international affairs in U.S. print and broadcast media. It will help the student develop competency in international journalism through the theory and practice of journalism and mass communication as they relate to international development, East-West discourses, and the flow of news and information.

**JOUR 50183 Media Management and Leadership.** Dramatic changes in technology and in the media's role in converging technologies require new management and leadership techniques and paradigms. Students will discuss existing case studies examining these changes. This course will give students a survey of some of the latest management and leadership theories, including a new sense of social responsibility. They will apply these theories to a number of different competitive, structural, motivational, strategic, and organizational problems of the media, primarily by solving problems in existing case studies and by writing original case studies.

**JOUR 50193 Economics and Finance of the Media.** The course will examine the economic environment and financial practices of the mass media, including the World Wide Web. The course will also examine how the media are affected by advertisers, competition, financial markets, and other economic forces. Understanding and structuring debt and equity, valuing media companies, and writing a business plan are included in the course work.

**JOUR 60153 Project in Broadcast Journalism.** This course will allow the student to take a real-world problem or opportunity that has a strong research component and develop it for course credit and for application on the job. The course is designed to afford students interested in broadcast journalism the opportunity to identify and extensively research a community or a broadcast issue or problem.

**JOUR 60163 Project in Print/Internet Publications.** This course will allow students the opportunity to take a workplace problem that has a strong research element and develop it for application on the job. Such a project could be developing a proposal for a series of stories on a major issue, preliminary work on an investigative series using social science research techniques, performing a management case study, conducting research on readership, or identifying the type of sources used in stories.

**JOUR 60970 Special Problems: Journalism and Mass Communication.** A conference course designed to give an individual student or group of students opportunities for additional specialized work in a particular area of concentration. (Maximum of 3 hours credit per semester may be repeated for maximum of 6 hours credit.)

### **Advertising / Public Relations Courses**

**JOUR 50133 Management of Public Relations and Advertising Departments/Firms or Agencies.** The course will examine management techniques, tactics, concerns and issues in handling public relations and advertising departments within organizations, corporate and nonprofit, and agencies or firms, from small independent operations to subsidiaries of larger entities.

**JOUR 50163 Issues and Crises in Public Communication.** The course covers the way issues of public concern are detected by news media and by public relations and advertising strategists as the issues develop, and it examines how communication of government policies as well as corporate and non-profit organization's concerns affect perceptions and subsequently public opinion.

**JOUR 60173 Project in Advertising/Public Relations.** This course will allow students an opportunity to take a workplace problem that has a strong research component and develop it for course credit and for application on the job. Projects could be creating a campaign, developing a program for a special public, such as an ethnic group or a particular age group, exploring new policies to solve workplace difficulties or potential problems, studying the way different publics view the organization with the idea of placing that opinion more in line with management objectives, planning a Web site or any other workplace assignment that lends itself to research and writing a proposal

**JOUR 60183 Public Relations and Advertising in International Practice.** An in-depth look at determinants that affect the way both nonprofit and profit-making organizations must function based on elements such as government, media ownership, culture and social structures. The course also examines commercial free speech as it functions in the USA and how communication efforts and persuasive strategies must be changed or adapted for other countries and regions.

**JOUR 60193 Global Cases and Campaigns.** A study of persuasive cases and campaigns that are international in scope. Documented cases will be reviewed for insight into elements that contributed to the effectiveness of the effort, and campaigns, such as some United Nations health campaigns that will be studied for their tactics and strategy as adjusted for different cultures.

**JOUR 70980 Thesis.** Thesis.

**JOUR 70990 Thesis.** Thesis.

### **General Courses**

**JOUR 50143 Social and Cultural History of the Media.** Seminar designed to explore the history of mass media. Issues discussed in this class will improve historical knowledge about the mass media and give a foundation for understanding the professional development of journalism and mass communication.

**JOUR 50153 Cultural Imperatives in International Communication.** Critical study of international discourse within a cultural context. Dependency theory, political and socio-economic factors affecting communication and relations in the context of world affairs. Questions of media imperialism, ideology, monopoly of knowledge, cultural narratives and post-colonial opinion.

**JOUR 60123 Mass Communication Theory.**

**JOUR 60143 Literature of Mass Communication.** Examination of literary works in journalism and mass communication. The course is designed to connect a journalism education to broader social science concepts in a manner that should stimulate critical thinking about the role of the media in American and international societies.

**JOUR 70903 Graduate Seminar.** Graduate capstone seminar that introduces the concepts used in developing a thesis or professional project. Includes guidance on formulating a proposal, necessary theoretical concepts and organizational structure of the project or thesis.

# Speech Communication

[Combined Masters/Bachelors 3/2 Program](#)  
[Courses of Instruction](#)

## Overview

Available on the Master of Science degree.

**Prerequisites:** Bachelor's degree, including at least 15 hours in Speech Communication and 9 hours in related areas.

The graduate major consists of 36 credit hours, including two basic plans.

**Plan I:** The **non-thesis** plan includes 36 hours of course work. A student electing this option must successfully complete oral and written comprehensive examinations as specified by the graduate committee.

**Plan II:** The **thesis** plan includes 30 hours of course work and 6 hours of thesis. A student electing this option must successfully complete the thesis and satisfactorily pass an oral defense of the thesis.

**General Information about Plan I and Plan II:** At least 24 hours of a student's program must be at the 60000 level. With special permission from the graduate adviser, students may take up to 6 hours outside the department.

## REQUIRED COURSES

SPCO 60113 Seminar in Interpersonal Communication

SPCO 60123 Communication Education

SPCO 60133 Measurement of Communication

SPCO 60143 Seminar in Social Influence

SPCO 60153 Contemporary Issues in Communication

SPCO 60163 Seminar in Organizational Communication

SPCO 60173 Research in Speech Communication

SPCO 60183 Theory of Communication

## Combined Masters/Bachelors 3/2 Program

TCU Speech Communication Majors may earn both a Bachelor of Arts or Science degree and a Master of Science degree in five years. Students may apply for the program after completing at least 106 semester hours and satisfying UCR and other degree requirements with the exception of 18 hours of elective courses. Students will complete 18 hours of graduate level courses during their fourth and fifth years of study satisfying the requirements for the Bachelor and Masters degrees.

To be eligible for the 3/2 program, students must formally apply for admission to the Speech Communication graduate program and meet the general requirements for admission to graduate study including, outstanding grade point average, letters of recommendation, and acceptable scores on the Graduate Record Examination's Verbal and Quantitative sections. Prospective 3/2 students must contact their advisory in the Department of Speech Communication or the Director of Graduate Studies for advisement.

## Courses of Instruction

**SPCO 50223 Nonverbal Communication.** Prerequisite: Majors only, senior or graduate standing. Review and critical analysis of theory and research applied to social, vocational and educational settings.

**SPCO 50233 Measurement of Communication.** 1.) Prerequisite: Senior or graduate standing. A study of principles of measurement theory, tactics for measuring communication variables, techniques of analysis and presentation of data, instruments and apparatus, and classic research studies in measuring communication behavior. 2.) Study of principles of measurement theory, tactics for measuring communication variables, techniques for analysis and presentation of data, instruments and apparatus and classic research studies in measuring communication behavior.

**SPCO 50970 Special Problems in Speech Communication.** Prerequisite: Senior or graduate standing. Specialized work in student's area of concentration. 1-6 semester hours, 3 hours maximum per semester.

**SPCO 60113 Seminar in Interpersonal Communication.** Review of advanced theoretical constructs and recent research related to interpersonal communication. Comprehension, critical evaluation and applications will be stressed.

**SPCO 60123 Communication Education.** Review and analysis of communication theory and research in instructional settings.

**SPCO 60133 Measurement of Communication.** Study of principles of measurement theory, tactics for measuring communication variables, techniques of analysis and presentation of data, instruments and apparatus, and classic research studies in measuring communication behavior.

**SPCO 60143 Seminar in Social Influence.** Explores issues of influence, compliance and resistance in interpersonal relationships from a social science perspective. Influence reciprocity and consequences to relationships are examined as effects of everyday social interaction.

**SPCO 60153 Contemporary Issues in Communication.** Examines communication in the context of various contemporary social issues.

**SPCO 60163 Seminar in Organizational Communication.** Addresses advanced concepts, issues and research

methodologies applicable to communication processes in modern complex human organizations.

**SPCO 60173 Research in Speech Communication.** Introduction to philosophy of graduate research; study of historical, critical, descriptive and experimental methodology and design, analysis of current research in area of specialization.

**SPCO 60183 Theory of Communication.** Examination and evaluation of social, psychological and linguistic theory applied to human communication behavior.

**SPCO 60193 Advanced Research Methods in Speech Communication.** Application of communication principles to organizational practice and/or research projects.

**SPCO 60970 Directed Study in Speech Communication.** Opportunity for individual work in a specialized area of concentration within the Speech Communication discipline.

**SPCO 70970 Research Problems.** Advanced research on special problems in speech communication. Content will vary according to the needs and interests of students and faculty.

**SPCO 70980 Thesis.** Prerequisite: Permission of chair.

**SPCO 70990 Thesis.** Thesis

# School of Education

[Application for Admission](#)  
[Admission Deadlines](#)

## Application for Admission

Because applications consider multiple criteria, incomplete applications cannot be considered. A complete application consists of:

1. The completed Application Form from the website or hard copy.
2. An essay stating your reasons for applying to the Graduate Program.
3. Two official transcripts from each college or university previously attended, sent directly to the Graduate Studies Office.
4. One letter of recommendation attesting to your character and ethical conduct from a person who knows you well. (Include contact information for follow-up).
5. Two letters of recommendation attesting to your competence, character and ethical conduct in professional settings. (Include contact information for follow-up).
6. Official TOEFL scores for non-native English speakers.
7. Evidence of current criminal record search
8. For the Counseling Program, a personal interview.
9. For programs leading to initial teacher certification, passing scores of the TASP test. (Reading 245, Math 230, Writing 220).
10. Application fee of \$50 is required before any consideration of applications. (Made payable to TCU)

## Graduate Admission Philosophy

The graduate programs in the School of Education reflect the complexity of Education as a professional field and, thus, require a holistic approach to the admissions process. No one criterion or set of criteria adequately predicts the probability of a student's success in these graduate programs or the professional endeavors that they are studying.

With this in mind, the University Admissions standards stated in the graduate catalog will be used as a benchmark. Students who do not meet these standards may provide alternative evidence in the form of GRE scores, scores on the Miller Analogies Test, or strong advocacy from a faculty member familiar with the student's work (if the student has taken courses at TCU).

In addition to the University standards, the School of Education understands that the serious responsibility educators assume in the lives of children requires consideration of the applicant's legal and ethical conduct and emotional stability.

Graduate education assumes competence and knowledge at a baccalaureate level. The School of Education asks that all applicants provide evidence of sufficient undergraduate preparation and competence for the degree sought.

## Admission Deadlines

The following deadlines are for consideration of complete applications:

November 16 -- Last Day to Complete Applications for Spring Admission  
March 16 -- Last Day to Complete Applications for Summer Admission  
July 16 -- Last Day to Complete Applications for Fall Admission

## Overview

The mission of the School of Education is to develop effective, ethical educators with a passion for learning. We meet that mission at TCU by offering excellent graduate programs taught in small classes by professors who know our students well and are able to design experiences which allow each student to develop personally and professionally and become leaders in their field.

Graduate programs for practicing professionals develop deep understanding and reflection in light of current theory and research. These programs include: Elementary Education, Secondary Education, Counseling, Special Education, Educational Foundations, and Educational Administration. We offer an M.B.A./Ed.D joint degree in Educational Leadership. This program prepares students to assume major leadership positions.

Graduate programs for initial teacher certification are specifically designed for mature students with a baccalaureate degree in a field other than education. These programs provide students with the pedagogical knowledge and experiences to become excellent beginning teachers and earn teacher certification in Texas.

# Programs for Practicing Professionals

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[Major in Educational Foundations](#)

[Major in Counseling](#)

[Major in Elementary Education](#)

[Major in Special Education](#)

[Major in Educational Administration](#)

[Courses of Instruction](#)

## Major in Educational Foundations

The M.Ed. with a major in Educational Foundations is designed to prepare educators to assume leadership roles in solving educational problems in a variety of settings such as schools, businesses, non-profit organizations and government agencies. Students come from many professional backgrounds. Educational Foundations is the name given to the contribution from disciplines such as Psychology, Philosophy, History and Sociology to the field of education. This degree is deeply rooted in the study of these contributions and the way in which they form a basis for thinking about educational questions and solving educational problems.

### *Professional Studies* (6 hours)

EDUC 60253 Historical and Philosophical Foundations of Education

EDUC 70953 Research in Education

### *Specialization* (12-15 semester hours)

EDUC 60823 Educational Evaluation

EDUC 60810 Advanced Educational Research Seminars

In consultation with the student's advisor, 4 Advanced Educational Research Seminars will be taken. One of them may be selected from any of the Advanced Educational Research Seminars offered. The other three are the specific seminars about the original work of major theorists in education.

### *Cognate* (9-12 semester hours)

In consultation with the student's advisor, 9-12 semester hours will be taken in a cognate area based on the interests and strengths of the student. Cognates may be selected from areas such as Child Studies, Dance, English as a Second Language, Educational Technology, Special Education, Literacy, Community Education and Urban Education. Students may select a cognate in a discipline outside the School of Education with approval of the advisor.

### *Culminating experience*: (3-6 semester hours)

Students may write a thesis, culminating in an oral defense, or a treatise.

## Major in Counseling

The M.Ed. in Counseling is designed to provide students with the necessary counseling skills and external resources to provide individual, preventive, responsive, and support services to counseling programs. This program is designed to prepare students to work in schools, institutions of higher learning, vocational and career institutions, churches, and industry. Students who pursue the 36-hour M.Ed. in Counseling have the option to pursue certification in School Counseling. All counseling classes can be applied to Texas professional licensure.

## School Counseling

The M.Ed. in Counseling with an emphasis on School Counseling meets the requirements of the State Board of Educator Certification and follows the guidelines for certification in School Counseling. The following courses are required as part of the 36-hour program in Counseling to meet these guidelines for certification and competency:

### *Professional Studies* (9 semester hours)

EDUC 50003 Diversity in American Education

EDUC 60313 Educational Assessment

EDUC 70953 Research in Education

EDUC 60223 Theories of Human Development *Specialization* (24 hours)

EDGU 50223 Helping Relationships

EDGU 50233 Career Development and Information

EDGU 50323 Small Group Dynamics

EDGU 60143 Counseling Interventions (Pre-requisite: EDGU 50223)

EDGU 60383 Counseling Theories and Techniques

EDGU 60613 Guidance and Counseling Programs

3 hours of elective study in a similar area *Field Experience* (3 hours) EDGU 70100 Practicum (300 hours)

**Certification Only.** Students who have completed their M.Ed. may be admitted to the program to receive school counseling certification instead of the Master's degree in Counseling, provided all requirements for admission to the program have been fulfilled. A minimum of 24 hours, including EDGU 70100, must be taken at TCU.

### *Other Course Offerings*

EDGU 60113 DSM: Counseling Abnormal Populations

EDGU 70323 Advanced Group Leadership (Pre-requisite: EDGU 70100, EDGU 50223, EDGU 50323, permission of instructor)

EDGU 70223 Supervision in Counseling (Pre-requisite: Master's degree in Counseling and permission of the instructor)

## Major in Elementary Education



The Major in Elementary Education is focused on instructional leadership in the classroom. The emphases are on (1) pedagogical knowledge that contributes to more effective teaching of subject matter, (2) knowledge of learners and their characteristics, and (3) knowledge of the educational contexts in which teaching and learning occur.

Prerequisites usually include completion of a bachelor's degree and initial teacher certification. However, a student who is pursuing a program of studies leading to initial teacher certification and who already possesses a bachelor's degree, may major in Elementary or Secondary Education with Initial Teacher Certification. In such cases, course work associated with the teaching specializations is generally done at the undergraduate level. Professional Studies courses are completed prior to other course work. Exceptions can be granted only through a graduate advisor.

*Professional Studies* (12 semester hours)

EDUC 50003 Diversity in American Education  
EDUC 60313 Educational Assessment  
EDUC 70953 Research in Education  
EDUC 50253 Technology Applications in Education

*Specialization* (18-21 hours)

EDEL 50503\* Communication Competencies of Linguistically and Culturally Diverse Children  
EDSP 60233 Children & Youth at Risk  
EDEL 60643 Seminar in Elementary School Science  
EDEL 60663 Seminar in Elementary School Math  
Electives: 6-9 hours from the following, selected in consultation with the student's advisor:  
EDRE 60153 Advanced Seminar in Literacy Instruction  
EDRE 60253 Literacy in the Content Area  
EDEL 60673 Seminar in Elementary School Social Studies  
EDEC 50133 Play & Creativity  
EDEC 50143 Early Childhood Curriculum  
EDEC 50123 Educational Programs for Young Children  
EDEC 60223 The Young Child  
ENGL 50243 Teaching Writing  
EDUC 60823 Program Evaluation  
EDAD 60113 Administrators and Teachers  
EDAD 60143 Administrative Life

*Thesis or Thesis* (3-6 semester hours)

\*If the student already holds ESL endorsement, EDEL 50503 becomes one of the electives rather than a requirement

\*\*If the student chooses the thesis option, then only 1 elective is chosen.

**Major in Special Education**

The Master of Education in Special Education prepares educators to work directly with students with disabilities and as collaborators with families, other professionals, and administrators. The program is designed for students who are already certified, or who are in the process of obtaining certification, at the elementary or secondary level. The course of study gives students the option of taking 18 hours of coursework leading to a certificate in generic special education. Students already holding a certificate in special education may use their elective hours to build a resource areas (e.g. early childhood; ESL; technology; educational administration) compatible with their interests in special education.

*Professional Studies* (12 semester hours)

EDUC 60213 Advanced Educational Psychology  
EDUC 60253 Historical and Philosophical Foundations of Education  
EDUC 60313 Educational Assessment  
EDUC 70953 Research in Education

*Specialization* (12-15 semester hours)

EDSP 60313 Educational Programs for Exceptional Children  
EDSP 60233 Understanding Exceptional Children and Youth At-Risk  
EDSP 50663 Motivating and Managing Students in the Classroom  
EDSP 60433 Issues and Practices in Collaboration  
KINE 60503 Physical Activities for Individuals with Disabilities  
Resource Area/ Electives (3-9 semester hours)

Courses are selected with approval of a graduate advisor, to complement the student's interest in special education.

*Internship\**, *Thesis or Treatise* (3-6 semester hours)

\*Required for certificate

**Major in Educational Administration**

The Major in Educational Administration is a non-thesis program which prepares individuals to serve as elementary and secondary principals, supervisors, and central office staff in public and private schools. In order to satisfy the State Board of Educator Certification requirements for the **Principal** Certificate (45 semester hours of graduate education), an additional 9 hours of graduate work beyond the M.Ed. program are required. These 9 hours may be from another college or university if taken within the last 15 years.

Students who take all 45 semester hours at TCU can also complete a specialization in any other master's major within the 45 hours, except Counseling, which would require 48 semester hours. However, careful planning is necessary and new graduate students should discuss this possibility with their advisor as soon as possible after matriculation.

*Professional Studies* (9 semester hours)

EDUC 60253 Historical and Philosophical Foundations of Education  
EDUC 60823 Educational Evaluation  
EDUC 70953 Research in Education

*Specialization* (24 hours)

EDUC 50003 Diversity in American Education  
EDUC 60013 Curriculum Theory  
EDAD 60103 Administrators, Schools and Districts  
EDAD 60113 Administrators & Teachers  
EDAD 60123 Administrators, Parents & Children  
EDAD 60133 Trends & Issues in Administration  
EDAD 60143 The Administrative Life  
EDXX 60XXX {An Elective Graduate Course in Curriculum or Pedagogy}

*Field Experience* (3 hours)

EDAD 70200 Internship in Administration

**The Principal's Certificate**

Students who have already earned a master's degree and who wish to pursue the EDAD Certificate Program will need to meet with advisors to determine the courses necessary for certification.

**Courses of Instruction**

**EDUC 50003 Diversity in American Education.** Prerequisite: Admission to Teacher Education Program or written permission of the Dean, School of Education. This course will equip educators with the necessary skills for multiethnic school environments. It focuses on developing an awareness of how education is connected to wider structures of social, cultural, economic life and encourages not only critical examination, but also discussion of alternatives to the present reality.

**EDUC 50970 Special Problems.** Prerequisite: Approval of advisor and course instructor.

**EDUC 60013 Curriculum Theory.** Addresses general principles and practices of curriculum development and curriculum change; organizational patterns for developing curriculum and implementing change.

**EDUC 60213 Advanced Educational Psychology.** The learning process and methods of application to the individual learner.

**EDUC 60223 Theories of Human Development.** Selected theories of human behavioral, social, and emotional development.

**EDUC 60253 Historical and Philosophical Foundations of Education.** Philosophic positions and the implications of these viewpoints on one's approach to and resolution of educational issues and questions will be examined.

**EDUC 60313 Educational Assessment.** Characteristics of tests, constructs, scoring, interpreting, evaluation, and test-taking skills as a form of problem-solving are included.

**EDUC 60810 Seminar in Educational Research.** may be repeated up to 13 hours)

**EDUC 60823 Educational Evaluation.** Evaluation of programs, curriculum projects, accreditation standards, and personnel appraisal are explored using different approaches to evaluation. Other topics include purpose, qualitative and quantitative evaluation design and data-collecting methods, sampling techniques, and reliability and validity. Particular emphasis is placed on case study for the purpose of planning, conducting and writing the evaluation for presentation to stakeholders.

**EDUC 70953 Research in Education.** Students are expected to gain an appreciation of the complexities of the research process, ways of conducting research, and a sense of the power and constraints of the various perspectives within which educational questions are pursued.

**EDUC 60120 The Role of the Inservice Teacher in Preservice Teacher Education.** Study of the role of the Cooperating Teacher in a teacher education conference. Includes clinical supervision, mastery learning, observation skills, conferencing skills and program design.

**EDUC 60293 Curriculum Workshop.** Prerequisite: At least one year's teaching experience and approval of instructor. Provides for development of curriculum materials and strategies for specific subject areas; application of curriculum theory to school and classroom situations.

**EDUC 60153 Technology Applications in Education.** An introduction to using educational technology for professional productivity and instructional purposes. Includes familiarity and operational skills with word processing, spreadsheets, databases, graphics, desktop publishing, telecommunications, instructional software and multimedia authoring programs.

**EDUC 60513 Practicum in Education.** Practical experiences in an educational setting designed to sensitize the student to the challenges of transforming theory into practice.

**EDUC 60980 Internship.** Supervised experience which emphasizes the application of theories of curriculum and instruction in a field-based setting. Options include the introduction of innovative teaching practices into a school or other educational setting or research focused on instructional practices. Graduate students in Education who possess a bachelor's degree with a non-education major and who have completed the specified course work may choose to apply the internship for certification purposes with the approval of the department. 1-6 semester hours with no more than 6 semester hours applied to the Master's degree)

**EDUC 70903 Treatise.** Students complete a paper under the advisement of a faculty member in the department.

**EDUC 70970 Special Problems in Education.** Prerequisite: Approval of advisor and instructor in course.

**EDUC 70980 Thesis.** Prerequisite: Admission to Candidacy.

**EDUC 70990 Thesis.** Thesis

### **Educational Administration**

**EDAD 60103 Administrators, Schools and Districts.** Relationships between different organizational patterns and administrative practices will be explored as well as the role of authority and decision making structures. Required of all majors in Educational Administration.

**EDAD 60113 Administrators and Teachers.** It will include concepts and issues derived from leadership, supervision, and law.

**EDAD 60123 Administrators, Parents and Children.** Foci will include community relations, communication, creating orderly, productive learning environments, and law.

**EDAD 60133 Trends and Issues in Educational Administration.** The course will normally be taught collaboratively with practicing administrators.

**EDAD 60143 Administrative Life.** This course is normally taken concurrently with EDAD 70200 Internship in Educational Administration. The course synthesizes prior course work, integrates new experiences from the Internship, and considers the alternatives each individual confronts in developing an administrative life, the jobs' technical and ethical demands, stresses and satisfactions.

**EDAD 70200 Internship in Educational Administration.** Planned program of leadership responsibilities in an educational institution or agency, commensurate with the student's graduate program, certification objectives, and employment goals. Emphasis on research application in a field-based setting. Responsibilities and projects are under the direction of the academic advisor and on-site supervisor.

**EDAD 70970 Special Problems in Administration.** Prerequisite: Approval of advisor and course instructor.

**EDAD 70001 Doctoral Pro-Seminar.** This course may be taken twice for a total of 2 semester hours.

**EDAD 70003 Foundational Readings Educational Administration.** This course will examine the professional and intellectual history of educational administration.

**EDAD 70013 Legal and Social Environment of Education.** Educational institutions operate within an environment that requires relationships with families, employees, and other private and public institutions. The primary focus of this course will be state and federal laws that regulate these relationships, with attention paid as well to social and political forces that influence the enforcement of laws.

**EDAD 70023 Managing Instructional Processes.** High achieving districts are led by administrators that focus on academic programs, set attainable goals, continuously assess the curriculum, evaluate staff and teachers, and assess student achievement. This course will highlight the importance of instructional leadership and of developing effective evaluation processes as well as professional development opportunities.

**EDAD 70033 Ethical and Moral Dimensions of Educational Leadership.** This course emphasizes enduring educational problems and fundamental philosophical issues, concepts that feature centrally in educational discourse, ethical standards and dilemmas, and conceptual analysis as a means for clarifying decisions regarding educational policy and practice.

**EDAD 80206 Internship.** A semester-long internship providing leadership experiences in an educational or corporate setting commensurate with the student's doctoral program. This course can be repeated three times for a total of 18 semester hours.

**EDAD 90980 Dissertation.** Dissertation. A maximum of six hours may be taken.

**EDAD 90990 Dissertation.** Dissertation. May be taken for a total of six semester hours.

### **Educational Computing**

**EDUC 60153 Technology Applications in Education.** An introduction to using educational technology for professional productivity and instructional purposes. Includes familiarity and operational skills with word processing, spreadsheets, databases, graphics, desktop publishing, telecommunications, instructional software and multimedia authoring programs.

**EDUC 60263 Internet Applications in Educations.** Survey of applications of the Internet for communicating and managing information for instructional and administrative purposes. Students develop skills in locating, organizing, evaluating, and communicating information, and consider issues related to using the Internet in educational contexts. Includes electronic mail, electronic discussion groups, file transfer utilities, search engines, and web site design.

### **Counseling**

**EDGU 50223 Helping Relationships.** Examination and practice of specific skills and processes essential to the development of helping relationships. Emphasis is placed on the development of interpersonal skills and professional ethics necessary to counseling.

**EDGU 50233 Career Development and Information.** Orientation to life planning and the world of work;

theoretical models of career choice; examine career information and resources and systems of career information utilization.

**EDGU 50323 Small Group Dynamics.** Study of the group as an interaction system, including: group process, group roles, guidelines for group selection and guidance, techniques for facilitating interaction, strategies for building credibility in groups, and the impact of life styles on group needs.

**EDGU 50970 Special Problems in Educational Guidance.** Special Problems

**EDGU 60113 DSM: Counseling Abnormal Populations.** Overview of DSM disorders, their prevention and treatment.

**EDGU 60143 Counseling Interventions.** Prerequisite: EDGU 50223. Examination of techniques, strategies and methods of counseling; strategies to deal with resistant clients and acting out children; approaches to parent and professional consultation; crisis intervention issues and resources, and ethical and legal issues in the practice of counseling.

**EDGU 60363 Admin Support Program.** Prerequisite: Admission to candidacy. Examine the history and philosophy of student development programs; standards of practice; organization, management, and leadership theories; ethical standards and principles; and management of programs and services.

**EDGU 60383 Counseling Theories and Techniques.** Orientation to established theories of counseling by examining and evaluating each theory's philosophical background, goals, and techniques and conceptualizing cases based on one's theoretical approach; consider issues in crisis counseling; and discuss ethical issues as they apply to hypothetical cases.

**EDGU 70970 Special Topics in Guidance and Counseling.** Focus on topics of interest to guidance counselors in schools and/or colleges and universities. Such topics might include sexual abuse, violence in dating and marriage, building resiliency in youth, family therapy, or other issues being raised by students, researchers, and/or society

**EDGU 60613 Guidance and Counseling Techniques.** Focus the development and implementation of school guidance programs, the services essential for effectiveness, coordination of pupil services with other elements of the educational program, strategies to build community resources and relationships, and program evaluation needs.

**EDGU 70100 Practicum.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Supervised application of counseling and guidance skills and concepts in elementary and secondary educational institutions. A minimum of 300 hours is required of on-site experience, with a minimum of 150 hours of direct client contact.

**EDGU 70200 Internship in Student Personnel Services.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Supervised employment of different roles and skills needed in the administration and practice of student development programs. A minimum of 300 hours is required of on-site experience, with a minimum of 150 hours of direct client contact.

**EDGU 70223 Supervision in Counseling.** Provide supervision of counselors-in-training under the supervision of supervising professor in class, schools, or agencies; examination of helper-helpee relationships through audiotape, videotape, observation, and in-class performance; the development of personal theory and strategies based on established theories and best practices of supervision in counseling.

**EDGU 70323 Advanced Group Leadership.** Application of advanced methods in group leadership integrating current theoretical knowledge with parallel experiences in intervention and techniques. Use of creative processes to facilitate group exploration in small group dynamics class for counselor trainees.

**EDGU 70610 Practicum in Student Personnel Services.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Examine specific roles and responsibilities of leaders and managers in student affairs programs through rotated service in at least two areas of student development for a total of 150 hours. A diary of daily activities, information, and questions is required.

## Elementary Education

**EDEL 50063 Seminar in Teaching Gifted and Talented Children.** Advanced study of methods to identify, assess and teach exceptionally capable students. Major emphasis is on developing skills and teaching methods. Other aspects cover guidance counseling process, social/emotional needs, working with parents, and model school-district programs.

**EDEL 50073 Teaching the Structure and Benefits of the Free Enterprise System.** An examination and assessment of existing curricular and instructional materials in the area of economics education, with an emphasis on integrating economics into the social studies curriculum K-12.

**EDEL 50203 Programs in Bilingual Education.** The rationale for bilingual-bicultural education including a survey of current programs. Includes lab experiences in public school classes.

**EDEL 50213 Seminar in Bilingual Education.** Methods and strategies in teaching the bilingual child; including English as a second language and Spanish as a first language. Observation and participation in bilingual classes required.

**EDEL 50503 Developing Communication Competencies of Linguistically and Culturally Diverse Students.** Prerequisites: Admission to Teacher Education Program or written permission of the Dean, School of Education; SPAN 50033 (cross-listed under GERM 50033, FREN 50033), or concurrent enrollment, or permission of instructor. Principles and practices of first and second language acquisition as they relate to the development of communication skills. Emphasis is placed on the interrelatedness of language processing (reading, writing, speaking and listening) to facilitate the learner's ability to construct meaning. Strategies to enhance social-communicative

and cognitive-academic language competence, and self-directed learning are addressed. Assessment procedures appropriate to second-language learners are introduced.

**EDEL 50513 Curriculum and Instruction in the Second Language Learning Classroom.** Curricular and instructional principles and practices to meet the academic development needs of first and second language learners in the classroom. Emphasis on strategies for providing content-area instruction and establishing learner-centered environments within various ESL settings. Texas requirements for second language learners are addressed.

**EDEL 50970 Special Problems in Elementary Education.** Prerequisite: Approval of advisor and course instructor .

**EDEL 60043 Seminar in Elementary School Science.** Advanced study of current issues in science education and of curricula, materials, and techniques utilized in the effective teaching of elementary school science.

**EDEL 60063 Seminar in Elementary School Mathematics.** Advanced study of modern curricula, strategies and techniques utilized in teaching and upgrading mathematics instruction in the elementary school.

**EDEL 60073 Seminar in Elementary School Social Studies.** Advanced study of curricula, strategies, and techniques utilized in teaching and upgrading social studies instruction in the elementary school.

**EDEL 60083 Seminar in Elementary School Language Arts.** Advanced study of curricula, strategies, and techniques utilized in teaching and upgrading language arts instruction in the elementary school. The interrelationships of all areas of language arts are given primary emphasis.

**EDEL 70970 Special Problems in Elementary Education.** Special problems in elementary education. Prerequisite: Approval of advisor and course instructor.

### Early Childhood

**EDEC 50010 Learner-Centered Teaching.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. This block melds content instruction and a semester-long practicum. In addition, to be working in classrooms or in other ways with students, under the supervision of teachers and SOE faculty, SOE faculty will cover content regarding: classroom management, assessment, parent and family relationships and issues, and professional roles and responsibilities. (15 hours credit)

**EDEC 50020 Professional Induction.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. During this semester, students will fulfill the State's requirements for student teaching. In addition, they will receive instruction in developing and implementing curricula that meet the developmental, cultural and linguistic needs of all learners. (15 hours credit).

**EDEC 50123 Educational Programs for Young Children.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Evaluation and development of educational programs for young children as affected by current social and economic trends. Emphasis on parent, community, school and interschool relationships, and on teacher responsibility in curriculum development.

**EDEC 50133 Play and Creativity.** Materials, techniques, and resources used in early childhood education for developing the affective, cognitive, and motor domains of young children. Study will include research on importance of play as vehicle for learning.

**EDEC 50143 Early Childhood Curriculum.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. The study of basic principles underlying curriculum construction and instructional practices in early childhood and primary education.

**EDEC 60133 Practicum in Early Childhood Education.** All-day observation and supervised teaching for a period of six weeks in the public schools. Accompanying regularly scheduled class meetings on the campus for the entire semester for the purpose of developing competencies and professional growth.

**EDEC 60223 The Young Child.** Study of research on behavior of young children and application to planned learning experiences.

**EDEC 70970 Special Problems in Early Childhood.** Special problems in early childhood education. Prerequisite: Approval of advisor and course instructor.

### Reading

**EDRE 50013 Analysis of Literacy Problems.** Prerequisites: EDRE 60053, 60153, or 50313 and Admission to the Teacher Education Program or written permission of the Dean, School of Education. Theory and techniques for using a variety of assessment strategies related to literacy development. Discussion and practice will be based on the interpretation of elementary and secondary students' performance on a variety of literacy tasks.

**EDRE 50043 Seminar in Children's Literature.** Advanced study of literature for children with special attention to principles of selection and use in the elementary school curriculum.

**EDRE 50143 Reading in the Secondary School.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Materials and methods for developing reading skills of the secondary school student in the various curriculum areas.

**EDRE 50153 Literature for Adolescents.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Survey of reading interests of secondary school youth. Wide reading of classical and contemporary books for adolescents in the several teaching fields with specific attention to principles of selection and use in the middle school and high school.

**EDRE 50223 Practicum in Reading.** Prerequisite: Admission to the Teacher Education Program or written

permission of the Dean, School of Education. Clinical techniques and procedures of remedial and diagnostic teaching of reading.

**EDRE 50313 Foundations of Literacy.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. The study of the theoretical bases for literacy instruction. Research from linguistics, cognitive psychology, and sociology will be studied as related to recommendations for practices in literacy instruction.

**EDRE 50970 Special Problems in Reading.** Prerequisite: Approval of advisor and course instructor.

**EDRE 60053 Advanced Study of Literacy Instruction.** Analyzes recent research, philosophies of instruction, curriculum development, literature, and assessments that can be used to improve students' reading, writing, and language abilities.

**EDRE 60153 Seminar in Promoting Literacy in the Subject Areas.** Instructional strategies include ways to integrate reading, writing, and study strategies.

**EDRE 70970 Special Problems in Reading.** Prerequisite: Approval of advisor and course instructor.

### Special Education

**EDSP 50000 Directed Study in Special Education.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Directed study in areas of student's interests and needs 1-3 sem. hours..

**EDSP 50013 Educating Students with Disabilities in the Mainstream.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. How to adapt methods, techniques and classroom environments to help children with disabilities to be more successful in regular and special education classrooms.

**EDSP 50663 Motivating and Managing Students in the Classroom.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Research-based methods for creating positive classroom and school climates, organizing and managing classrooms, improving instruction, dealing with classroom discipline problems, and developing prosocial behaviors in children and youth.

**EDSP 50970 Directed Study.** Prerequisite: Approval of advisor and course instructor.

**EDSP 60233 Understanding Exceptional Children and Youth At-Risk.** Examination of the diverse characteristics of children and youth with learning and behavior problems and the impact of these characteristics on social and academic development.

**EDSP 60313 Educational Programs for Exceptional Children.** Study of methods and materials appropriate for use with exceptional children.

**EDSP 60323 Internship in Special Education.** Field experience under direct supervision of a certified special education teacher in public or private school setting. Minimum of 200 clock hours required.

**EDSP 60433 Issues and Practices in Collaboration.** A review of current research and practices concerning the concept of shared responsibility between regular educators and special educators to provide coordinated and inclusive educational arrangements for all children and youth and to facilitate their success within the least restrictive environment.

**EDSP 60453 Practicum in Educational Testing.** Prerequisite: Permission of course instructor. Administration and interpretation of evaluative instruments in education and/or guidance settings.

**EDSP 60970 Special Problems in Special Education.** Prerequisite: Approval of advisor and course instructor.

### Secondary Education

**EDSE 50013 Instructional Planning.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Developing instructional strategies; diagnosing and correcting learning difficulties; appraising pupil achievement; organizing the classroom for learning; controlling misbehavior; justifying teacher plans. Each student will schedule 10 hours for school observations.

**EDSE 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the TCU teacher education program. As a part of the effective teacher model, this course will focus on instructional design and implementation; motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDSE 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. As a part of the effective teacher model, this course will focus on instructional design and implementation, motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDSE 50063 Seminar in Teaching the Gifted and Talented.** Advanced study of methods to identify, assess and teach exceptionally capable students. Major emphasis is on developing skills and teaching methods. Other aspects cover guidance counseling process, social/emotional needs, working with parents, and model school-district programs.

**EDSE 50073 Seminar in Economic Education.** An examination and assessment of existing curricular and instructional materials in the area of economic education, with an emphasis on integrating economics into the social

studies curriculum K-12.

**EDSE 50213 Teaching in Bilingual Classrooms.** Methods and strategies in teaching the bilingual child; including English as a second language and Spanish as a first language. Observation and participation in bilingual classes required.

**EDSE 50503 Developing Communication Competencies of Linguistically and Culturally Diverse Students.**  
Prerequisites: Admission to Teacher Education Program or written permission of the Dean, School of Education; SPAN 50033 (cross-listed under GERM 50033, FREN 50033), or concurrent enrollment, or permission of instructor. Principles and practices of first and second language acquisition as they relate to the development of communication skills. Emphasis is placed on the interrelatedness of language processing (reading, writing, speaking and listening) to facilitate the learner's ability to construct meaning. Strategies to enhance social-communicative and cognitive-academic language competence, and self-directed learning are addressed. Assessment procedures appropriate to second-language learners are introduced.

**EDSE 50513 Curriculum and Instruction in the Second Language Learning Classroom.** Curricular and instructional principles and practices to meet the academic development needs of first and second language learners in the classroom. Emphasis on strategies for providing content-area instruction and establishing learner-centered environments within various ESL settings. Texas requirements for second language learners are addressed.

**EDSE 50970 Special Problems in Secondary Education.** Prerequisite: Approval of advisor and course instructor

**EDSE 70970 Spec Problems in Secondary Education.** Approval of advisor and course instructor.

#### Other Courses

**EDMS 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the TCU teacher education program. As a part of the effective teacher model, this course will focus on instructional design and implementation; motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDMS 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. As a part of the effective teacher model, this course will focus on instructional design and implementation, motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDUC 60343 Learning Environments.** An examination of the conceptual histories, social histories, and architectural histories of education settings provides insight into how these institutions impact social relations, activities, decision-making and sense of competence in children. Students actually participate with children in imagining and creating alternative learning environments.

# M.B.A/Ed.D. Joint Program in Educational Leadership

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## [Mission](#)

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### **Mission**

The purpose of this program is to prepare students to assume major leadership positions in a wide variety of education-related organizations by applying managerial skills and educational leadership in the field of education. The program is designed to prepare students to enter educational management in school systems, regional, state, or federal governments, research institutions, private foundations, or private sector companies.

### **Objectives**

- To promote understanding of the business and organizational world by incorporating TCU's "broad-based MBA core";
- To provide students the background necessary to complete Superintendent Certification in Texas, if they choose, which requires understanding of leadership in the educational community, instructional, and administrative leadership;
- To develop leaders who understand the operations and leadership of organizations in both public and private sector;
- To develop leaders prepared to take advantage of increasing opportunities for creating market-driven educational institutions and systems;
- To develop educational leaders who operate with a global perspective in a diverse and rapidly evolving professional field;
- To develop educational leaders who operate with clear-cut ethical and moral commitments for the education of all children;
- To develop educational leaders able to envision and create new settings now possible through the availability of information technologies.

### **Admission and Degree Requirements**

Candidates must be initially admitted to TCU's Day MBA program and meet all 36 hours of core requirements as well as the START Workshop and the Professional Development Program. At the completion of the first year of the MBA program, and a summer of coursework in educational administration, students will apply for candidacy in the doctoral program. Admission will depend on their performance in both MBA and education courses to that point. In the event a student elects to complete the MBA without continuing into the doctoral program, he or she must meet all remaining requirements for the MBA (i.e., 18 elective units in the School of Business). If a student's work is unsatisfactory in MBA courses, and they are not permitted to continue, he or she may not be admitted into doctoral work.

Throughout the program, students must maintain a B average. At the completion of coursework, students will take written and oral comprehensives before proceeding into the dissertation stage.

### **Coursework Requirements**

#### Fall Semester - First Year

ACCT 60011 Corporate Financial reports (1 unit)  
ACCT 60012 Interpreting Financial Reports (2 units)  
FINA 60003 Economic Environment of Business (3 units)  
MANA 60003 Business Strategy and Structure (3 units)  
MANA 60033 Managing People (3 units)  
EDAD 70001 Doctoral Pro-Seminar (1 unit)

#### Spring Semester - First Year

ACCT 60021 Operating Cost Systems (1 unit)  
ACCT 60022 Planning, Performance Measurement & Control (2 units)  
DESC 60013 Data Analysis for Managerial Decisions (3 units)  
FINA 60013 Management of Financial Resources (3 units)  
MANA 60043 Managing Information Technology (3 units)  
MARK 60013 Market Driven Strategies (3 units)  
EDAD 70001 Doctoral Pro-seminar (1 unit)

#### Summer Semester - First Year

EDAD 80206 Internship (6 units)  
EDAD 70003 Foundational Readings in Educational Administration (3 units)  
EDAD 60810 Seminar in Educational Research (3 units)

#### Fall Semester - Second Year

DESC 60023 Manufacturing & Servs Ops Management (3 units)  
MANA 60023 Legal & Social Environment of Business (3 units)  
EDAD 70013 Legal & Social Environment of Education (3 units)  
EDAD 70023 Managing Instructional Processes (3 units)

#### Spring Semester - Second Year

MANA 60063 Strategic Management in Global Environment (3 units)  
EDAD 80206 Internship (6 units)



EDUC 60810 Seminar In Educational Research (3 units)

Summer Semester - Second Year

EDAD 80206 Internship (6 units)

Elective - SOE or Business

Fall Semester - Third Year

EDAD 70033 Ethical & Moral Dimensions of Ed Leadership (3 units)

EDAD 90980 Dissertation (6 units)

Thereafter, students must complete at least 6 units in EDAD 90990 Dissertation.

The total number of units will reach approximately 100 units.

## Programs for Initial Certification

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[MAJOR IN ELEMENTARY EDUCATION WITH INITIAL TEACHER CERTIFICATION EC-4  
THREE-TWO PROGRAMS IN EDUCATION](#)  
[MAJOR IN MIDDLE SCHOOL EDUCATION WITH INITIAL TEACHER CERTIFICATION  
THREE-TWO PROGRAM IN EARLY CHILDHOOD EDUCATION](#)  
[THREE-TWO PROGRAM IN MIDDLE SCHOOL  
THREE-TWO PROGRAM IN SECONDARY SCHOOL  
COURSES OF INSTRUCTION](#)

Teacher certification is not synonymous with the Master's Degree in Education. In most instances, however, courses taken in pursuit of the Master's Degree will satisfy the requirements for initial teacher certification. A minimum of 18 semester hours of graduate courses is required prior to undergraduate student teaching or a graduate internship. The sequence of courses is specified and allows for deviation only with special permission. In addition to courses, competency must be established in the areas of computer literacy and speech communication and a minimum of 45 clock hours of field experiences in area schools must be completed. It is imperative that students who are working toward initial certification in conjunction with the M. Ed. stay in close communication with a graduate advisor.

Prerequisites include completion of a bachelor's degree with an appropriate area of specialization or teaching field and submission of passing scores in all three areas of the TASP. Elementary and secondary certification students may not be admitted into graduate teacher certification programs before submitting passing TASP scores or SAT, ACT or TAAS scores (see Admission to the Teacher Education Program guidelines in the *TCU Undergraduate Studies Bulletin*). Additional requirements for admission and retention in the Teacher Education Program (including procedure for criminal record search) may also be found in the *TCU Undergraduate Studies Bulletin*.

Prerequisite or concurrent requirements for the teaching certificate include a) coursework at either the undergraduate or graduate level in educational psychology and child development; and b) sufficient undergraduate coursework in elementary content (e.g. English, math, social studies, and science). Satisfaction of these requirements will be determined by the advisor, in consultation with the Certification Officer.

### **MAJOR IN ELEMENTARY EDUCATION WITH INITIAL TEACHER CERTIFICATION EC-4**

*Professional Development* (12 or 18\* hours)  
 EDUC 50253 Technology Applications in Education  
 EDUC 60313 Educational Assessment  
 EDUC 60253 Historical and Philosophical Foundations of Education  
 EDUC 70953 Research in Education  
 EDUC 60980 Internship\* (unless emergency-certified + 1 year teaching in accredited school)

*Early Childhood Specialization* (9 hours)  
 EDEC 50133 Play and Creativity  
 EDEL 50503 Developing Communication Competencies of Linguistically and Culturally Diverse Students  
 EDSP 60233 Children and Youth At-Risk

*Pedagogical Studies* (15 hours)  
 EDRE 60053 Advanced Literacy Instruction  
 EDEL 60043 Seminar in Elementary School Science  
 EDEL 60063 Seminar in Elementary School Mathematics  
 EDEL 60073 Seminar in Elementary Social Studies  
 EDSP 50663 Motivating and Managing Students in the Classroom

\*Eligibility for the Internship (minimum 12-week, full-day experience in an elementary classroom under the supervision of a cooperating teacher and university supervisor) requires successful completion of all 3 courses in the Early Childhood specialization, and at least 4 courses in the pedagogical studies area, as well as Technology Applications and Assessment.

### **MAJOR IN MIDDLE SCHOOL EDUCATION WITH INITIAL TEACHER CERTIFICATION**

The 36-hour M.Ed. program with a major in Middle School Education prepares students who have a baccalaureate degree to become certified to teach in 4th through 8th grade. It is assumed that persons seeking this degree will already have completed at least one teaching field as required for Texas teacher certification. If such is not the case, it will be necessary for the student to complete an appropriate teaching field of at least 24 hours. For additional information see Teaching Fields for Middle School Education in the School of Education section of the TCU Undergraduate Studies Bulletin. The first five professional Studies courses are completed prior to other course work. Exceptions can be granted only through a graduate advisor.

*Professional Studies* (15 semester hours)  
 EDUC 60213 Advanced Educational Psychology  
 EDUC 60223 Theories of Human Development  
 EDUC 60253 Historical and Philosophical Foundations of Education  
 EDUC 60313 Educational Assessment  
 EDUC 70953 Research in Education

*Middle School Education Specialization* (15 semester hours)  
 EDMS 50023 Effective Teaching and Classroom Implementation  
 EDRE 60153 Seminar in Promoting Literacy in the Subject Area

EDSP 50663 Motivating and Managing Students in the Classroom  
EDUC 50253 Technology Applications in Education  
ELECTIVE 3 hours in teaching field content area

*Internship* (6 semester hours)  
EDUC 60980 Internship in Teaching\*

\*If graduate students are already in the employ of school districts, they may substitute (EDUC 50003) Diversity in Education and (EDSP 60233) Understanding Exceptional Children and Youth At-Risk for the 6 hours of (EDUC 60980) Internship.

### **MAJOR IN SECONDARY EDUCATION WITH INITIAL TEACHER CERTIFICATION**

The 36-hour M.Ed. program with a major in Secondary Education prepares students who have a baccalaureate degree to become certified to teach in 8th through 12th grade. It is assumed that persons seeking this degree will already have completed at least one teaching field as required for Texas teacher certification. If such is not the case, it will be necessary for the student to complete an appropriate teaching field of at least 24 hours. For additional information see Teaching Fields for Secondary Education in the School of Education section of the TCU Graduate Studies Bulletin. The first five professional Studies courses are completed prior to other course work. Exceptions can be granted only through a graduate advisor.

*Professional Studies* (15 semester hours)  
EDUC 60213 Advanced Educational Psychology  
EDUC 60223 Theories of Human Development  
EDUC 60253 Historical and Philosophical Foundations of Education  
EDUC 60313 Educational Assessment  
EDUC 70953 Research in Education

*Secondary Education Specialization* (15 semester hours)  
EDSE 50013 Effective Teaching and Classroom Implementation  
EDRE 60153 Seminar in Promoting Literacy in the Subject Area  
EDSP 50663 Motivating and Managing Students in the Classroom  
EDUC 50253 Technology Applications in Education  
ELECTIVE 3 hours in teaching field content

*Internship* (6 semester hours)  
EDUC 60890 Internship in Teaching\*

\*If graduate students are already in the employ of school districts, they may substitute (EDUC 50003) Diversity in Education and (EDSP 60233) Understanding Exceptional Children and Youth At-Risk for the 6 hours of (EDUC 60980) Internship.

### **THREE-TWO PROGRAMS IN EDUCATION**

The School of Education, in conjunction with appropriate departments across other University schools and colleges, offers a program in which the student seeking teaching certification can earn both a Bachelor's degree and a Master's degree (M. Ed.) in a five year period. The program is designed to provide students with the necessary coursework to complete the requirements for teacher certification, area of specialization (for Elementary Certification) or teaching field content areas (for Secondary Certification), and other degree requirements for both the Bachelor's and Master's degrees. (Note: Students intending to pursue the Three-Two Program should make their plans known as early as possible to the School of Education to ensure proper advising.)

During the first three years students enroll in courses leading to the completion of University Curriculum Requirements (UCR) and their chosen specialization or teaching fields(s). Students must have completed a minimum of 95-101 hours by the end of their junior year to be considered for admission to the Three-Two Program.

Students interested in pursuing the Three-Two must first apply for admission to the Teacher Education Program by the junior year. The same requirements that apply to undergraduate admission apply to Three-Two students (Please refer to the [Undergraduate Studies Bulletin](#) for *Admission to Teacher Education Program* requirements.) Students applying to the three-two program in Early Childhood Education must have completed 12 hours of education classes EDUC 20003 (Critical Investigations of Teaching and Learning in Today's Society), EDUC 30013 (Introduction to Educational Technology), EDUC 30143 (Child Development), and EDEC 30103 (Introduction to Early Childhood Education). An overall grade point average of 3.0 is necessary for admission.

If admitted to the graduate program, the student begins coursework toward the M.Ed. degree in the fourth year of study at TCU. During this year, students must complete 12 semester hours of graduate coursework in education and 12 semester hours of upper division or graduate level coursework in the student's first and/or second teaching fields. During year five, the student will complete 24 semester hours of graduate coursework in education, including 6 hours of internship. After successful completion of the first year of graduate work, the student may petition the appropriate dean to be awarded the undergraduate degree. The student must complete all requirements for the bachelor's degree before beginning the second year of graduate study.

If a student decides not to pursue a graduate degree, or is denied admission to the Graduate School, s/he will be able to complete the Bachelor's degree and earn initial teacher certification by completing the additional semester hours of required coursework.

### **THREE-TWO PROGRAM IN EARLY CHILDHOOD EDUCATION**

The Three-Two Program in Early Childhood requires completion of 36 hours of education courses at the graduate level.

*Professional Studies* (12 semester hours)

EDUC 60213 Advanced Educational Psychology  
 EDUC 60253 Historical and Philosophical Foundations of Education  
 EDUC 60313 Educational Assessment  
 EDUC 70953 Research in Education

*Specialization* (18 semester hours)

In consultation with the student's advisor, 18 semester hours will be selected from Education courses based on the interests and strengths of the student. A specialization may be selected in the areas of Early Childhood, Reading, Computer Education, Special Education, Bilingual Education, English as a Second Language or Pedagogical Studies. The latter consists of a combination of courses related to the teaching of early childhood education subjects such as science, social studies, mathematics, language arts, and children's literature. If an academic specialization is pursued, courses may be selected from the Humanities, the Sciences, the Fine Arts, or a combination of studies from these academic areas.

*Internship* (6 semester hours)

EDUC 60980 Internship

### THREE-TWO PROGRAM IN MIDDLE SCHOOL

The Three-Two Program requires completion of 36 hours of education courses at the graduate level.

*Professional Studies* (15 semester hours)

EDUC 60213 Advanced Educational Psychology  
 EDUC 60253 Historical and Philosophical Foundations of Education  
 EDUC 60313 Educational Assessment  
 EDUC 70953 Research in Education  
 EDUC 50003 Diversity in Education  
 or  
 EDSP 60233 Understanding Exceptional Children and Youth At-Risk

*Middle School Education Specialization* (15 semester hours)

EDMS 50013 Effective Teaching and Classroom Implementation  
 EDRE 60153 Seminar in Promoting Literacy in the Subject Area  
 EDSP 50663 Motivating and Managing Students in the Classroom  
 EDUC 50253 Technology Applications in Education  
 ELECTIVE 3 hours in teaching field content area

*Internship*

EDMS 60980 Internship

### THREE-TWO PROGRAM IN SECONDARY SCHOOL

The Three-Two Program requires completion of 36 hours of education courses at the graduate level.

*Professional Studies* (15 semester hours)

EDUC 60213 Advanced Educational Psychology  
 EDUC 60253 Historical and Philosophical Foundations of Education  
 EDUC 60313 Educational Assessment  
 EDUC 70953 Research in Education  
 EDUC 50003 Diversity in Education  
 or  
 EDSP 60233 Understanding Exceptional Children and Youth At-Risk

*Secondary School Education Specialization* (15 semester hours)

EDSE 50013 Effective Teaching and Classroom Implementation  
 EDRE 60153 Seminar in Promoting Literacy in the Subject Area  
 EDSP 50663 Motivating and Managing Students in the Classroom  
 EDUC 50253 Technology Applications in Education  
 ELECTIVE 3 hours in teaching field content area

*Internship*

EDSE 60980 Internship

### COURSES OF INSTRUCTION

**EDUC 50003 Diversity in American Education.** Prerequisite: Admission to Teacher Education Program or written permission of the Dean, School of Education. This course will equip educators with the necessary skills for multiethnic school environments. It focuses on developing an awareness of how education is connected to wider structures of social, cultural, economic life and encourages not only critical examination, but also discussion of alternatives to the present reality.

**EDUC 50970 Special Problems.** Prerequisite: Approval of advisor and course instructor.

**EDUC 60013 Curriculum Theory.** Addresses general principles and practices of curriculum development and curriculum change; organizational patterns for developing curriculum and implementing change.

**EDUC 60213 Advanced Educational Psychology.** The learning process and methods of application to the individual learner.

**EDUC 60223 Theories of Human Development.** Selected theories of human behavioral, social, and emotional development.

**EDUC 60253 Historical and Philosophical Foundations of Education.** Philosophic positions and the implications of these viewpoints on one's approach to and resolution of educational issues and questions will be examined.

**EDUC 60313 Educational Assessment.** Characteristics of tests, constructs, scoring, interpreting, evaluation, and test-taking skills as a form of problem-solving are included.

**EDUC 60810 Seminar in Educational Research.** may be repeated up to 13 hours)

**EDUC 60823 Educational Evaluation.** Evaluation of programs, curriculum projects, accreditation standards, and personnel appraisal are explored using different approaches to evaluation. Other topics include purpose, qualitative and quantitative evaluation design and data-collecting methods, sampling techniques, and reliability and validity. Particular emphasis is placed on case study for the purpose of planning, conducting and writing the evaluation for presentation to stakeholders.

**EDUC 70953 Research in Education.** Students are expected to gain an appreciation of the complexities of the research process, ways of conducting research, and a sense of the power and constraints of the various perspectives within which educational questions are pursued.

**EDUC 60120 The Role of the Inservice Teacher in Preservice Teacher Education.** Study of the role of the Cooperating Teacher in a teacher education conference. Includes clinical supervision, mastery learning, observation skills, conferencing skills and program design.

**EDUC 60293 Curriculum Workshop.** Prerequisite: At least one year's teaching experience and approval of instructor. Provides for development of curriculum materials and strategies for specific subject areas; application of curriculum theory to school and classroom situations.

**EDUC 60343 Learning Environments.** An examination of the conceptual histories, social histories, and architectural histories of education settings provides insight into how these institutions impact social relations, activities, decision-making and sense of competence in children. Students actually participate with children in imagining and creating alternative learning environments.

**EDUC 60153 Technology Applications in Education.** An introduction to using educational technology for professional productivity and instructional purposes. Includes familiarity and operational skills with word processing, spreadsheets, databases, graphics, desktop publishing, telecommunications, instructional software and multimedia authoring programs.

**EDUC 60513 Practicum in Education.** Practical experiences in an educational setting designed to sensitize the student to the challenges of transforming theory into practice.

**EDUC 60980 Internship.** Supervised experience which emphasizes the application of theories of curriculum and instruction in a field-based setting. Options include the introduction of innovative teaching practices into a school or other educational setting or research focused on instructional practices. Graduate students in Education who possess a bachelor's degree with a non-education major and who have completed the specified course work may choose to apply the internship for certification purposes with the approval of the department. 1-6 semester hours with no more than 6 semester hours applied to the Master's degree)

**EDUC 70903 Treatise.** Students complete a paper under the advisement of a faculty member in the department.

**EDUC 70970 Special Problems in Education.** Prerequisite: Approval of advisor and instructor in course.

**EDUC 70980 Thesis.** Prerequisite: Admission to Candidacy.

**EDUC 70990 Thesis.** Thesis

#### **Educational Administration**

**EDAD 60103 Administrators, Schools and Districts.** Relationships between different organizational patterns and administrative practices will be explored as well as the role of authority and decision making structures. Required of all majors in Educational Administration.

**EDAD 60113 Administrators and Teachers.** It will include concepts and issues derived from leadership, supervision, and law.

**EDAD 60123 Administrators, Parents and Children.** Foci will include community relations, communication, creating orderly, productive learning environments, and law.

**EDAD 60133 Trends and Issues in Educational Administration.** The course will normally be taught collaboratively with practicing administrators.

**EDAD 60143 Administrative Life.** This course is normally taken concurrently with EDAD 70200 Internship in Educational Administration. The course synthesizes prior course work, integrates new experiences from the Internship, and considers the alternatives each individual confronts in developing an administrative life, the jobs? technical and ethical demands, stresses and satisfactions.

**EDAD 70200 Internship in Educational Administration.** Planned program of leadership responsibilities in an educational institution or agency, commensurate with the student's graduate program, certification objectives, and

employment goals. Emphasis on research application in a field-based setting. Responsibilities and projects are under the direction of the academic advisor and on-site supervisor.

**EDAD 70970 Special Problems in Administration.** Prerequisite: Approval of advisor and course instructor.

**EDAD 70001 Doctoral Pro-Seminar.** This course may be taken twice for a total of 2 semester hours.

**EDAD 70003 Foundational Readings Educational Administration.** This course will examine the professional and intellectual history of educational administration.

**EDAD 70013 Legal and Social Environment of Education.** Educational institutions operate within an environment that requires relationships with families, employees, and other private and public institutions. The primary focus of this course will be state and federal laws that regulate these relationships, with attention paid as well to social and political forces that influence the enforcement of laws.

**EDAD 70023 Managing Instructional Processes.** High achieving districts are led by administrators that focus on academic programs, set attainable goals, continuously assess the curriculum, evaluate staff and teachers, and assess student achievement. This course will highlight the importance of instructional leadership and of developing effective evaluation processes as well as professional development opportunities.

**EDAD 70033 Ethical and Moral Dimensions of Educational Leadership.** This course emphasizes enduring educational problems and fundamental philosophical issues, concepts that feature centrally in educational discourse, ethical standards and dilemmas, and conceptual analysis as a means for clarifying decisions regarding educational policy and practice.

**EDAD 80206 Internship.** A semester-long internship providing leadership experiences in an educational or corporate setting commensurate with the student's doctoral program. This course can be repeated three times for a total of 18 semester hours.

**EDAD 90980 Dissertation.** Dissertation. A maximum of six hours may be taken.

**EDAD 90990 Dissertation.** Dissertation. May be taken for a total of six semester hours.

### **Educational Computing**

**EDUC 60153 Technology Applications in Education.** An introduction to using educational technology for professional productivity and instructional purposes. Includes familiarity and operational skills with word processing, spreadsheets, databases, graphics, desktop publishing, telecommunications, instructional software and multimedia authoring programs.

**EDUC 60263 Internet Applications in Educations.** Survey of applications of the Internet for communicating and managing information for instructional and administrative purposes. Students develop skills in locating, organizing, evaluating, and communicating information, and consider issues related to using the Internet in educational contexts. Includes electronic mail, electronic discussion groups, file transfer utilities, search engines, and web site design.

### **Counseling**

**EDGU 50223 Helping Relationships.** Examination and practice of specific skills and processes essential to the development of helping relationships. Emphasis is placed on the development of interpersonal skills and professional ethics necessary to counseling.

**EDGU 50233 Career Development and Information.** Orientation to life planning and the world of work; theoretical models of career choice; examine career information and resources and systems of career information utilization.

**EDGU 50323 Small Group Dynamics.** Study of the group as an interaction system, including: group process, group roles, guidelines for group selection and guidance, techniques for facilitating interaction, strategies for building credibility in groups, and the impact of life styles on group needs.

**EDGU 50970 Special Problems in Educational Guidance.** Special Problems

**EDGU 60113 DSM: Counseling Abnormal Populations.** Overview of DSM disorders, their prevention and treatment.

**EDGU 60143 Counseling Interventions.** Prerequisite: EDGU 50223. Examination of techniques, strategies and methods of counseling; strategies to deal with resistant clients and acting out children; approaches to parent and professional consultation; crisis intervention issues and resources, and ethical and legal issues in the practice of counseling.

**EDGU 60363 Admin Support Program.** Prerequisite: Admission to candidacy. Examine the history and philosophy of student development programs; standards of practice; organization, management, and leadership theories; ethical standards and principles; and management of programs and services.

**EDGU 60383 Counseling Theories and Techniques.** Orientation to established theories of counseling by examining and evaluating each theory's philosophical background, goals, and techniques and conceptualizing cases based on one's theoretical approach; consider issues in crisis counseling; and discuss ethical issues as they apply to hypothetical cases.

**EDGU 70970 Special Topics in Guidance and Counseling.** Focus on topics of interest to guidance counselors in schools and/or colleges and universities. Such topics might include sexual abuse, violence in dating and marriage, building resiliency in youth, family therapy, or other issues being raised by students, researchers, and/or society

**EDGU 60613 Guidance and Counseling Techniques.** Focus the development and implementation of school guidance programs, the services essential for effectiveness, coordination of pupil services with other elements of the educational program, strategies to build community resources and relationships, and program evaluation needs.

**EDGU 70100 Practicum.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Supervised application of counseling and guidance skills and concepts in elementary and secondary educational institutions. A minimum of 300 hours is required of on-site experience, with a minimum of 150 hours of direct client contact.

**EDGU 70200 Internship in Student Personnel Services.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Supervised employment of different roles and skills needed in the administration and practice of student development programs. A minimum of 300 hours is required of on-site experience, with a minimum of 150 hours of direct client contact.

**EDGU 70223 Supervision in Counseling.** Provide supervision of counselors-in-training under the supervision of supervising professor in class, schools, or agencies; examination of helper-helpee relationships through audiotape, videotape, observation, and in-class performance; the development of personal theory and strategies based on established theories and best practices of supervision in counseling.

**EDGU 70323 Advanced Group Leadership.** Application of advanced methods in group leadership integrating current theoretical knowledge with parallel experiences in intervention and techniques. Use of creative processes to facilitate group exploration in small group dynamics class for counselor trainees.

**EDGU 70610 Practicum in Student Personnel Services.** Prerequisite: Admission to candidacy and successful completion of EDGU 50223, 50323 and 60383. Examine specific roles and responsibilities of leaders and managers in student affairs programs through rotated service in at least two areas of student development for a total of 150 hours. A diary of daily activities, information, and questions is required.

### Elementary Education

**EDEL 50063 Seminar in Teaching Gifted and Talented Children.** Advanced study of methods to identify, assess and teach exceptionally capable students. Major emphasis is on developing skills and teaching methods. Other aspects cover guidance counseling process, social/emotional needs, working with parents, and model school-district programs.

**EDEL 50073 Teaching the Structure and Benefits of the Free Enterprise System.** An examination and assessment of existing curricular and instructional materials in the area of economics education, with an emphasis on integrating economics into the social studies curriculum K-12.

**EDEL 50203 Programs in Bilingual Education.** The rationale for bilingual-bicultural education including a survey of current programs. Includes lab experiences in public school classes.

**EDEL 50213 Seminar in Bilingual Education.** Methods and strategies in teaching the bilingual child; including English as a second language and Spanish as a first language. Observation and participation in bilingual classes required.

**EDEL 50503 Developing Communication Competencies of Linguistically and Culturally Diverse Students.** Prerequisites: Admission to Teacher Education Program or written permission of the Dean, School of Education; SPAN 50033 (cross-listed under GERM 50033, FREN 50033), or concurrent enrollment, or permission of instructor. Principles and practices of first and second language acquisition as they relate to the development of communication skills. Emphasis is placed on the interrelatedness of language processing (reading, writing, speaking and listening) to facilitate the learner's ability to construct meaning. Strategies to enhance social-communicative and cognitive-academic language competence, and self-directed learning are addressed. Assessment procedures appropriate to second-language learners are introduced.

**EDEL 50513 Curriculum and Instruction in the Second Language Learning Classroom.** Curricular and instructional principles and practices to meet the academic development needs of first and second language learners in the classroom. Emphasis on strategies for providing content-area instruction and establishing learner-centered environments within various ESL settings. Texas requirements for second language learners are addressed.

**EDEL 50970 Special Problems in Elementary Education.** Prerequisite: Approval of advisor and course instructor.

**EDEL 60043 Seminar in Elementary School Science.** Advanced study of current issues in science education and of curricula, materials, and techniques utilized in the effective teaching of elementary school science.

**EDEL 60063 Seminar in Elementary School Mathematics.** Advanced study of modern curricula, strategies and techniques utilized in teaching and upgrading mathematics instruction in the elementary school.

**EDEL 60073 Seminar in Elementary School Social Studies.** Advanced study of curricula, strategies, and techniques utilized in teaching and upgrading social studies instruction in the elementary school.

**EDEL 60083 Seminar in Elementary School Language Arts.** Advanced study of curricula, strategies, and techniques utilized in teaching and upgrading language arts instruction in the elementary school. The interrelationships of all areas of language arts are given primary emphasis.

**EDEL 70970 Special Problems in Elementary Education.** Special problems in elementary education. Prerequisite: Approval of advisor and course instructor.

### Early Childhood

**EDEC 50010 Learner-Centered Teaching.** Prerequisite: Admission to the Teacher Education Program or written

permission of the Dean, School of Education. This block melds content instruction and a semester-long practicum. In addition, to be working in classrooms or in other ways with students, under the supervision of teachers and SOE faculty, SOE faculty will cover content regarding: classroom management, assessment, parent and family relationships and issues, and professional roles and responsibilities. (15 hours credit)

**EDEC 50020 Professional Induction.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. During this semester, students will fulfill the State's requirements for student teaching. In addition, they will receive instruction in developing and implementing curricula that meet the developmental, cultural and linguistic needs of all learners. (15 hours credit).

**EDEC 50123 Educational Programs for Young Children.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Evaluation and development of educational programs for young children as affected by current social and economic trends. Emphasis on parent, community, school and interschool relationships, and on teacher responsibility in curriculum development.

**EDEC 50133 Play and Creativity.** Materials, techniques, and resources used in early childhood education for developing the affective, cognitive, and motor domains of young children. Study will include research on importance of play as vehicle for learning.

**EDEC 50143 Early Childhood Curriculum.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. The study of basic principles underlying curriculum construction and instructional practices in early childhood and primary education.

**EDEC 60133 Practicum in Early Childhood Education.** All-day observation and supervised teaching for a period of six weeks in the public schools. Accompanying regularly scheduled class meetings on the campus for the entire semester for the purpose of developing competencies and professional growth.

**EDEC 60223 The Young Child.** Study of research on behavior of young children and application to planned learning experiences.

**EDEC 70970 Special Problems in Early Childhood.** Special problems in early childhood education. Prerequisite: Approval of advisor and course instructor.

### Reading

**EDRE 50013 Analysis of Literacy Problems.** Prerequisites: EDRE 60053, 60153, or 50313 and Admission to the Teacher Education Program or written permission of the Dean, School of Education. Theory and techniques for using a variety of assessment strategies related to literacy development. Discussion and practice will be based on the interpretation of elementary and secondary students' performance on a variety of literacy tasks.

**EDRE 50043 Seminar in Children's Literature.** Advanced study of literature for children with special attention to principles of selection and use in the elementary school curriculum.

**EDRE 50143 Reading in the Secondary School.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Materials and methods for developing reading skills of the secondary school student in the various curriculum areas.

**EDRE 50153 Literature for Adolescents.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Survey of reading interests of secondary school youth. Wide reading of classical and contemporary books for adolescents in the several teaching fields with specific attention to principles of selection and use in the middle school and high school.

**EDRE 50223 Practicum in Reading.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Clinical techniques and procedures of remedial and diagnostic teaching of reading.

**EDRE 50313 Foundations of Literacy.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. The study of the theoretical bases for literacy instruction. Research from linguistics, cognitive psychology, and sociology will be studied as related to recommendations for practices in literacy instruction.

**EDRE 50970 Special Problems in Reading.** Prerequisite: Approval of advisor and course instructor.

**EDRE 60053 Advanced Study of Literacy Instruction.** Analyzes recent research, philosophies of instruction, curriculum development, literature, and assessments that can be used to improve students' reading, writing, and language abilities.

**EDRE 60153 Seminar in Promoting Literacy in the Subject Areas.** Instructional strategies include ways to integrate reading, writing, and study strategies.

**EDRE 70970 Special Problems in Reading.** Prerequisite: Approval of advisor and course instructor.

### Special Education

**EDSP 50000 Directed Study in Special Education.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Directed study in areas of student's interests and needs 1-3 sem. hours..

**EDSP 50013 Educating Students with Disabilities in the Mainstream.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. How to adapt methods, techniques and classroom environments to help children with disabilities to be more successful in regular and special education classrooms.



**EDSP 50663 Motivating and Managing Students in the Classroom.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Research-based methods for creating positive classroom and school climates, organizing and managing classrooms, improving instruction, dealing with classroom discipline problems, and developing prosocial behaviors in children and youth.

**EDSP 50970 Directed Study.** Prerequisite: Approval of advisor and course instructor.

**EDSP 60233 Understanding Exceptional Children and Youth At-Risk.** Examination of the diverse characteristics of children and youth with learning and behavior problems and the impact of these characteristics on social and academic development.

**EDSP 60313 Educational Programs for Exceptional Children.** Study of methods and materials appropriate for use with exceptional children.

**EDSP 60323 Internship in Special Education.** Field experience under direct supervision of a certified special education teacher in public or private school setting. Minimum of 200 clock hours required.

**EDSP 60433 Issues and Practices in Collaboration.** A review of current research and practices concerning the concept of shared responsibility between regular educators and special educators to provide coordinated and inclusive educational arrangements for all children and youth and to facilitate their success within the least restrictive environment.

**EDSP 60453 Practicum in Educational Testing.** Prerequisite: Permission of course instructor. Administration and interpretation of evaluative instruments in education and/or guidance settings.

**EDSP 60970 Special Problems in Special Education.** Prerequisite: Approval of advisor and course instructor.

### Secondary Education

**EDSE 50013 Instructional Planning.** Prerequisites: Admission to the Teacher Education Program or written permission of the Dean, School of Education. Developing instructional strategies; diagnosing and correcting learning difficulties; appraising pupil achievement; organizing the classroom for learning; controlling misbehavior; justifying teacher plans. Each student will schedule 10 hours for school observations.

**EDSE 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the TCU teacher education program. As a part of the effective teacher model, this course will focus on instructional design and implementation; motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDSE 50023 Effective Teaching and Classroom Implementation.** Prerequisite: Admission to the Teacher Education Program or written permission of the Dean, School of Education. As a part of the effective teacher model, this course will focus on instructional design and implementation, motivation of students to promote and enhance learning in the classroom; management issues pertinent to student behavior and learning outcomes; and preparation of a variety of formal and informal assessment strategies.

**EDSE 50063 Seminar in Teaching the Gifted and Talented.** Advanced study of methods to identify, assess and teach exceptionally capable students. Major emphasis is on developing skills and teaching methods. Other aspects cover guidance counseling process, social/emotional needs, working with parents, and model school-district programs.

**EDSE 50073 Seminar in Economic Education.** An examination and assessment of existing curricular and instructional materials in the area of economic education, with an emphasis on integrating economics into the social studies curriculum K-12.

**EDSE 50213 Teaching in Bilingual Classrooms.** Methods and strategies in teaching the bilingual child; including English as a second language and Spanish as a first language. Observation and participation in bilingual classes required.

**EDSE 50503 Developing Communication Competencies of Linguistically and Culturally Diverse Students.** Prerequisites: Admission to Teacher Education Program or written permission of the Dean, School of Education; SPAN 50033 (cross-listed under GERM 50033, FREN 50033), or concurrent enrollment, or permission of instructor. Principles and practices of first and second language acquisition as they relate to the development of communication skills. Emphasis is placed on the interrelatedness of language processing (reading, writing, speaking and listening) to facilitate the learner's ability to construct meaning. Strategies to enhance social-communicative and cognitive-academic language competence, and self-directed learning are addressed. Assessment procedures appropriate to second-language learners are introduced.

**EDSE 50513 Curriculum and Instruction in the Second Language Learning Classroom.** Curricular and instructional principles and practices to meet the academic development needs of first and second language learners in the classroom. Emphasis on strategies for providing content-area instruction and establishing learner-centered environments within various ESL settings. Texas requirements for second language learners are addressed.

**EDSE 50970 Special Problems in Secondary Education.** Prerequisite: Approval of advisor and course instructor

**EDSE 70970 Spec Problems in Secondary Education.** Approval of advisor and course instructor.



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## College of Fine Arts

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### Overview

The College of Fine Arts comprises the departments of Art and Art History, Ballet and Modern Dance, Theatre, and the School of Music. The Department of Art and Art History offers the MFA in Art and the MA in Art History. The Department of Ballet and Modern Dance offers the MFA in Ballet or Modern Dance, as well as a Teacher Certification Program in Dance. The School of Music offers the MM in Performance, Musicology, Theory/Composition, Conducting, and Pedagogy, as well as the MEd in Music Education, and an Artist Diploma in Piano.

Our faculty are dedicated teachers who combine strong academic training with years of professional experience in their disciplines. They pride themselves on their ability to convey to their students the knowledge necessary for successful lives and careers in the 21st century. We also have visiting faculty, guest artists, and performers who interact with students throughout the year enriching their learning experiences.

Resources available to students include numerous computer labs, lighting and sound systems, specialized libraries and conditioning equipment, galleries, art and dance studios, theaters, and performance halls. Our new Walsh Center for the Performing Arts was opened in 1999. Importantly, our programs enjoy close working relationships with the Kimbell Art Museum, the Fort Worth Symphony, Casa Mañana Theatre and the other visual and performing arts institutions in the Dallas/Fort Worth Metroplex.

# Art and Art History

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[Art History](#)

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## Overview

**Art Facilities.** TCU maintains a number of facilities appropriate to the graduate art student. The Art and Art History Department is housed in one of the best-designed and fully equipped facilities in the Southwest-the J. M. Moudy Building for the Visual Arts and Communication, designed by Roche, Dinkeloo and Associates of Connecticut. The campus library houses a fine collection of art and art-related books, catalogues and journals. The Art Department slide library holds some 150,000 slides and its own collection of art books and periodicals. The Moudy Exhibition Hall displays international, national and regional art. Fort Worth's galleries and three major museums-the Modern Art Museum of Fort Worth, the Amon Carter Museum and the Kimbell Art Museum-are conveniently located near the campus. Dallas, with its many galleries and excellent art museums, is 40 minutes away by car.

## Art History

Available on the Master of Arts degree.

**The Graduate Program in Art History** enables students to gain a deeper understanding of the history of art, its objects, and its methods. An integral component of this program, which sets it apart from many others, is "the museum experience": the opportunity to study in art museums and work with museum professionals. Centering on the art object, the program allows students to expand their knowledge of the historical, stylistic, and theoretical dimensions of the visual arts, while having the practical experience of working directly with art objects and in museums with professional staffs. Students participate in courses that utilize the resources of the Amon Carter Museum, the Modern Art Museum of Fort Worth, and the Kimbell Art Museum, and serve internships in these and other art museums. Graduates will be prepared to engage in work at the Ph.D. level and pursue careers in the teaching and art museum professions.

**Prerequisites:** In addition to meeting the minimum requirements for admission established by the University, applicants will normally have completed 18 semester hours (6 courses) in art history. The department will consider applications from qualified students in other fields. Applicants are expected to have studied one foreign language-French, German, Italian, Spanish, or one approved by the department-for two years or have reading proficiency. The TOEFL exam is required for foreign students and must be passed at the level set by the university. The application must include: a statement of no more than 250 words describing the applicant's academic and professional objectives; a writing sample (such as an undergraduate paper) of 1250 to 2500 words; three letters of recommendation; GRE General Test scores.

## Degree Requirements

**Course Requirements:** The program requires 30 hours of course work and 6 hours for the Thesis. Upon approval of the faculty, entering students may transfer up to 6 hours of graduate study in art history earned prior to admittance. Required courses are:

70003 Methods and Issues in Art History (3 hrs)

70013 The Art Museum (3 hrs)

70023 Studies in Connoisseurship (3 hrs)

70100 Museum Seminar (3 hrs)

70983 Internship (3 hrs)

70996 Thesis (6 hrs)

The remaining 15 hours are elective courses; students are strongly encouraged to enroll in courses that reflect chronological and geographical diversity. Generally, a student may not earn more than 3 hours of graduate credit in coursework taken outside of the art history program.

**Thesis requirement:** The thesis is to be fulfilled by a paper, or its equivalent, that demonstrates advanced research skills. The thesis should be the result of independent study, the revision and improvement of a seminar paper, or writing generated by the student's museum internship. In all cases, the topic must receive approval of the student's advisor. The thesis will be overseen by department faculty members, in conjunction with a museum professional.

**Language requirement:** Students are required to pass a reading proficiency examination in French, German, Italian, Spanish, or another language approved by the faculty upon entering the program. The language examination is administered at the beginning of the fall semester. Students not passing the examination have two options:

Option 1: Retake and pass the examination at the beginning of the following semester.

Option 2: Enroll in two semesters (or an approved intensive equivalent) of second year foreign language study and earn at least a "B" in both semesters (or their equivalent). This option must be completed by the beginning of the student's second year in the program.

Students who do not satisfy the language requirement by the beginning of their second year may be withdrawn from the program.

**Oral Examination:** Candidates for the M.A. degree are required to perform satisfactorily in a final oral examination.

## Courses of Instruction

**ART 60123 American Art 1914 to the Present.** American Art from 1914 to the present.

**ART 60173 Early Italian Renaissance Art.** Early Italian Renaissance Art

**ART 60183 High and Late Italian Renaissance Art.** High and Late Italian Renaissance Art

**ART 60193 Northern Renaissance Painting: Van Eyck - Bruegel.** Symbol and Reality: Renaissance art in northern Europe.

**ART 60203 17th Century Italian and Spanish Art.** 17th century Italian and Spanish art.

**ART 60213 Old Master Drawings.** Old Master Drawings

**ART 60333 Modern Art I: Romantic classicism to Impressionism.** Modern Art I: Romantic Classicism to Impressionism.

**ART 60343 Modern Art II: Post-Impressionism to Surrealism.** Modern Art II: Post-Impressionism to Surrealism

**ART 60353 Picasso: Artist of the Century.** Picasso: Artist of the Century

**ART 60363 17th Century Flemish-Dutch Painting.** 17th Century Flemish-Dutch Painting

**ART 60500 Special Topics in Art History.** Special Topics in Art History

**ART 60603 Art Since 1945.** Art since 1945.

**ART 60613 Modern Architecture.** Modern Architecture: 1750 to the present.

**ART 60623 History of the Print.** History of the Print

**ART 70003 Methods and Issues in Art History.** A seminar focusing on the historiography of art history and current methodologies employed by the discipline. Topics include the origins of art history, research techniques employed to study the production and reception of the art object, the premises and results of contemporary modes of interpreting the art object, as well as current issues in the field.

**ART 70013 The Art Museum.** A seminar which assess a broad range of historical and contemporary issues, practices, and concerns of art museums, and which examines more specifically the collections and philosophies of the Amon Carter Museum, the Kimbell Art Museum, and the Modern Art Museum of Fort Worth. The class includes numerous museum-site sessions.

**ART 70023 Studies in Connoisseurship.** A seminar on the physical characteristics of art works, focusing on the science/art of authenticating and identifying art works in terms of authorship and date. Information also on artistic techniques, condition, and conservation. The chronological emphasis of the course may vary, depending on the particular interests of the instructor.

**ART 70100 Museum Seminar.** This seminar offers students the opportunity to study an historical topic in depth, within an art museum environment. The course's specific topic varies, but the course always centers on actual works of art. Therefore, the seminar will meet the majority of the time in an art museum and include the participation of museum professionals. (3-9 sem. hrs.)

**ART 70300 Special Topics Seminar.** A seminar that offers the opportunity to study various significant topics in depth. (3-12 sem. hrs.)

**ART 70983 Internship.** Prerequisite: completion of the first year of the graduate program in art history. Students must apply and interview for an internship. A semester-long internship in an art museum.

**ART 70996 Thesis.** Prerequisite: Completion of 27 semester hours of the graduate program in art history.

### Studio Art

Master of Fine Arts degree available in painting, printmaking or sculpture.

TCU offers a two-year (60-semester-hour) program in art leading to the Master of Fine Arts degree. Areas of specialization include painting, drawing, sculpture, and printmaking. The faculty welcomes applicants whose work displays high quality, originality and sustained visual ideas.

**Prerequisites:** B.F.A., or equivalent, including concentration in intended specialty as evidenced by appropriate credit, an acceptable portfolio of work, a statement of professional experience and goals, and letters of recommendation. Admission to the program is based on:

- Portfolio acceptable to faculty committee
- Strong G.P.A. in undergraduate art courses
- Statement of professional experience and goals
- Good overall academic G.P.A.
- Three letters of recommendation

**Degree Requirements:** A total of at least four semesters of graduate work is required. At least 60 semester hours must be earned, including no less than 12 in one area of specialization, and one hour in Thesis Exhibition. Six hours of Graduate Seminar, 12 hours of Art 60120 and 6 hours of Art History are required. Three hours of Art History must be 60603 Art Since 1945 or another contemporary art history course, depending on the schedule of classes. The other 3 hours in art history may be chosen in consultation with the student's advisory committee. The remaining hours may be selected with the approval of the student's thesis committee, but with no more than 6

hours taken outside the department.

Suggested Credit-Hour Distribution:

**First Year:**

1st semester  
9 studio hours  
3 grad. critique hrs.  
3 seminar hours  
*15 total hours*

2nd semester  
9 studio hours  
3 grad. critique hrs.  
3 art history hours  
*15 total hours*

**Second Year:**

1st semester  
9 studio hours  
3 grad. critique hrs.  
3 seminar hours  
*15 total hours*

*2nd semester*  
8 studio hours  
3 grad. critique hrs.  
1 thesis exhibition hr.  
3 art history hours  
*15 total hours*

**Sequential Summary:** First semester-request appointment of thesis committee; complete sequence of courses as approved by committee; complete any conditions contained in the admission letter from the Graduate Office. Second semester-complete sequence of courses as approved by committee; seek candidacy approval of committee. Third semester-request committee approval for preparation of Thesis Exhibition; complete sequence of courses approved by committee. Fourth semester-enroll for Art 70991 Thesis Exhibition with major adviser as chair of committee; complete approved sequence of courses; give careful attention to the special deadlines for graduating students as they are outlined in the Bulletin or "Information and Deadlines for Graduation" available from the Graduate Office. Students are advised to work at least two weeks ahead of deadlines to avoid disappointments caused by unexpected delays and schedule conflicts.

**Thesis Committees:** Students admitted to the program will be assigned a temporary adviser in their major or specialty area until an ultimate area of specialization is determined. In the first six weeks of study the student must request, in writing, that the department chair appoint a faculty member as a permanent major adviser. The student must confer with the proposed major adviser, and ensure that the faculty member is prepared to accept the student before requesting the chair to appoint the major adviser. The student may also suggest the names of two other faculty members to serve on the thesis committee. The thesis committee is formally appointed by the Graduate Office on the recommendation of the Chair of the Department of Art and Art History.

While every effort will be made to compose a committee of the student's first choices, it may be necessary to make changes in light of the student's field of concentration, and the load or commitments of the faculty members.

A student may request, in writing, to the chair of the department, that a change be made of the major adviser, or committee members, if the field of specialization changes, or if other justifiable reasons arise that would make the continuation of the existing committee contrary to the best interests of the students or the program.

The major adviser will be responsible for committee activities, for aiding the student in matters of the program and for informing the chair of the department, in writing, of the progress of the student.

**Colloquia:** Colloquia are offered by the faculty of the department. These are intended to serve the specific purpose of establishing a personal and informal means of communication between students and faculty. The colloquia will feature presentations and discussions by on and off-campus speakers, faculty and members of the Department of Art and Art History.

**Candidacy:** Admission to candidacy requires the approval of the thesis committee of each student. Admission to candidacy is expected no later than the end of the first academic year of graduate study. Those who have not been admitted to candidacy by the beginning of the second academic year may not earn additional credits. Those who wish additional elective credits may continue for a probationary period of not more than 12 semester hours as a 'non-degree' student. Further enrollment will be permitted only if a student is re-admitted to the degree program.

**Exhibition:** Thesis exhibition enrollment requires admission to candidacy as a prerequisite. Actual installation of the thesis exhibition requires approval of the thesis committee. The written portion of the thesis exhibition also requires committee approval. This written portion, and the format of the permanent record of the thesis exhibition, will be determined by the committee. The written portion of the MFA requirement is to be called 'Thesis Exhibition Statement' and will contain the following: 1) Title page; 2) Approval (signatures) page; 3) Index to the written portion; 4) Curriculum Vitae of the student; 5) List of illustrations (with title, media, dimensions); 6) Narration; 7)

Illustrations in the form of photographs.

The narration (6 above) will take one of the following formats: a) program notes of an explanatory nature from the student's work in the exhibition, b) student's personal evaluation of the art forms contained in the exhibit or c) contemporary or historical perspectives supporting the student's exhibit.

Three bound copies of the Thesis Exhibition Statement are required. Two of these are retained by the Library and one by the Department of Art and Art History. Each copy will contain photographs mounted on separate sheets, with details of title, media and dimensions. The departmental copy is to be accompanied, separately, by 35mm color slides.

**Graduate Assistantships:** Graduate assistantships are offered each year to qualified candidates. Graduate assistants have an obligation of eight hours a week in service to the Department. They are given a full tuition waiver. Departmental assistants are given a full tuition waiver plus a stipend. Graduate and departmental assistants are assigned a private studio space.

## Courses of Instruction

### Studio Art

**ART 60100 Life Studies.** LIFE STUDIES 1-21 hours

**ART 60120 Graduate Critique.** Graduate Critique. 3-12 hours.

**ART 60140 Painting.** Painting. 1-21 hours.

**ART 60160 Printmaking (Intaglio).** Printmaking (Intaglio) 1-15 hours.

**ART 60170 Printmaking (Lithography).** Printmaking (Lithography) 1-15 hours.

**ART 60180 Printmaking (Screenprinting).** Printmaking (Screenprinting) 1-15 hours.

**ART 60240 Sculpture.** Sculpture

**ART 60903 Seminar in Art Criticism.** Seminar in Art Criticism

**ART 60913 Seminar in Art Professions.** Seminar in Art professions.

**ART 60970 Special Problems.** Special Problems 1-21 hours.

**ART 70991 Thesis Exhibition.** Prerequisite: Admission to candidacy.

### Art History

**ART 60123 American Art 1914 to the Present.** American Art from 1914 to the present.

**ART 60173 Early Italian Renaissance Art.** Early Italian Renaissance Art

**ART 60183 High and Late Italian Renaissance Art.** High and Late Italian Renaissance Art

**ART 60193 Northern Renaissance Painting: Van Eyck - Bruegel.** Symbol and Reality: Renaissance art in northern Europe.

**ART 60203 17th Century Italian and Spanish Art.** 17th century Italian and Spanish art.

**ART 60213 Old Master Drawings.** Old Master Drawings

**ART 60333 Modern Art I: Romantic classicism to Impressionism.** Modern Art I: Romantic Classicism to Impressionism.

**ART 60343 Modern Art II: Post-Impressionism to Surrealism.** Modern Art II: Post-Impressionism to Surrealism

**ART 60353 Picasso: Artist of the Century.** Picasso: Artist of the Century

**ART 60363 17th Century Flemish-Dutch Painting.** 17th Century Flemish-Dutch Painting

**ART 60500 Special Topics in Art History.** Special Topics in Art History

**ART 60603 Art Since 1945.** Art since 1945.

**ART 60613 Modern Architecture.** Modern Architecture: 1750 to the present.

**ART 60623 History of the Print.** History of the Print

# Ballet and Modern Dance

[Teacher Certification Program in Dance](#)

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## Overview

Available on the Master of Fine Arts degree.

**Prerequisites:** A bachelor's degree in Dance or special permission is required. In addition to meeting the general entrance requirements as stated in the Graduate Studies Bulletin, admission to the M.F.A. program in Ballet or Modern Dance requires the following: an interview, an audition in advanced technique, a video or presentation of choreography, a writing sample, sophomore level credit in a foreign language, three letters of recommendation and a statement of professional experience and goals. Computer literacy is strongly recommended. The best prepared candidates will have 3-5 years of work in the field.

**Dance Facilities:** The Ballet and Modern Dance Building includes three large studios; two have balconies from which guests may observe classes. One of the studios is used to host informal performances. Drapes, lighting equipment and a sound system make this an effective performance space, and the lab environment invites experimentation. The Department possesses a computer lab; all studios are computer-ready and equipped with sound and video systems. The Body Work Lab has the latest Pilates-based conditioning equipment.

**The Graduate Program in Ballet and Modern Dance** emphasizes performance, choreography and education. While providing strong technical training, performance skills and the development of choreographic talents, graduates are prepared to be educators and to assume leadership roles in the field.

## Teacher Certification Program in Dance

**A Teacher Certification Program in Dance** is now available at TCU. This certification qualifies students to teach dance in secondary education (grades 6-12) in the state of Texas. The program targets TCU Ballet and Modern Dance majors. Students with previous dance training, currently majoring in other fields, may qualify. An intermediate level proficiency in technique is required for entrance. Students who complete this teacher training program will be qualified dance teachers who are technically proficient and theoretically informed. Certification provides graduates with marketable skills. Combining courses from the dance and education departments, TCU provides a thorough certification program which offers students excellent teacher preparation. (See School of Education: Initial Elementary or Secondary Certification.)

**A dance cognate** is available within the Masters in Education with a major in Educational Foundations. (See School of Education: Educational Foundations.)

## Degree Requirements

The program requires 45 semester hours of course work, including the following minimum requirements:

60100 or 60200 Ballet or Modern Dance Technique (6 hrs.)

50130 Teaching Methods (3 hrs.)

60130 Dance Pedagogy (3 hrs.)

50150 Choreography (3 hrs.)

60150 Advanced Choreographic Studies (3 hrs.)

50160 History of the Dance (3 hrs.)

60160 Dance History: Issues & Analysis (3 hrs.)

50400 Aesthetics of Dance (3 hrs.)

60900 Research Methods (3 hrs.)

70980 Projects (3 hrs.)

70990 Thesis (3 hrs.)

To support individual areas of interest and meet educational goals, a minimum of nine additional hours of course work are selected in consultation with the faculty advisor. At least half of all course work, inclusive of thesis, must be at the 60000 level or higher. A grade of "C" in a graduate course will not be accepted toward satisfaction of degree requirements unless it is offset by a grade of "A" in another graduate course carrying the same number of credit hours. No more than two "C" grades can count toward graduation, but all grades of "C" will be used in GPA computation. A limited number of courses may be taken outside the Department of Ballet and Modern Dance with the approval of the faculty advisor. The department chair will have final approval. All graduate students will participate in departmental concerts as performers or as production support.

Six semester hours of transfer credit may be submitted for acceptance. Under special circumstances, additional hours may be considered subject to approval by the chair, the college dean and the dean of Graduate Studies.

A minimum residency of two semesters is required. For successful completion of the program, students will produce a concert, complete a written thesis and pass a final comprehensive oral examination.

**NOTE:** Curriculum is currently under revision. Students are expected to check with their graduate advisors to determine available courses.

## Courses of Instruction

**BALT 50100 Ballet Technique.** Theory and practice of ballet. 3-6 sem. hrs.; 3 hrs. maximum per semester.

**BALT 50130 Teaching Methods.** Prerequisite: Senior or graduate standing. Theory, methods of teaching dance



with specific focus on ballet (3-9 semester hrs., 3 hrs. maximum per semester)

**BALT 50150 Choreography.** Prerequisite: Senior or graduate standing. Creating original works and directing aspects of their productions. 3-12 semester hours.

**BALT 50160 History of the Dance.** Primitive to Renaissance; Renaissance to Modern. In-depth study and research project on a historical topic relevant to the individual program of study. 3 hrs. minimum.

**BALT 50180 Supported Adagio II.** Prerequisite: Senior or graduate standing. Advanced level of BALT 30180. Practice and/or performance of supported adagio roles. (1-4 sem. hrs.)

**BALT 50320 Advanced Ensemble and Performance.** Prerequisite: Senior or graduate standing and permission of instructor. Technique and ensemble training. May be taken in place of upper level technique classes. (3-9 semester hours, 3 hours maximum per semester.)

**BALT 60100 Ballet Technique.** Advanced technique of ballet. 3-18 sem. hrs.; 3 hrs maximum per semester.

**BALT 60130 Dance Pedagogy.** A course using both seminar and praxis formats addressing selected issues and their applications to dance instruction. 1-3 sem. hrs.; 9 hrs. maximum.

**BALT 60150 Advanced Choreographic Studies.** Advanced study of choreographic concepts, techniques and applications. Course work includes research of style and form, development of choreographic material, and a public presentation of the work, 1-3 hrs per sem.; 9 hrs. maximum .

**BALT 60160 Dance History: Issues and Analysis.** Targeted study of developments in dance seen from social, anthropological, political, philosophical and/or artistic perspectives culminating in an in-depth project or research paper selected in consultation with instructor. 1-3 hrs. per sem.; 9 hrs. maximum.

**BALT 60320 Ensemble and Performance III.** Prerequisite: Permission of instructor. Advanced technique and ensemble training. (3-9 sem. hrs.; 3 hrs. maximum per semester.)

**BALT 60900 Research Problems.** Individual study in theatre, ballet and/or modern dance. (1-9 sem. hrs.)

**BALT 70980 Projects.** Thesis

**BALT 70990 Thesis.** Thesis

**MODA 50130 Teaching Methods.** Prerequisite: Senior or graduate standing. Theory, methods and materials of teaching dance. (3-9 semester hours, 3 hours maximum per semester.)

**MODA 50150 Choreography.** Prerequisite: Senior or graduate standing. Create original works and directing aspects of their production. (3-12 semester hours.)

**MODA 50160 History of the Dance.** Prerequisite: Senior or graduate standing. Research in the areas of dance history. (3-6 semester hours.)

**MODA 50200 Modern Dance Technique.** Prerequisite: Senior or graduate standing. Theory and practice of modern dance. 3-6 semester hours, 3 hours maximum per semester.

**MODA 50320 Advanced Ensemble and Performance.** Technique and ensemble training. (3-9 sem. hrs.; 3 hrs. maximum per semester.)

**MODA 50400 Aesthetics of Dance.** Discussion and reading concerning performance, choreography, pedagogy, criticism and/or research. 1-3 sem. hrs.

**MODA 60130 Dance Pedagogy.** -A course using both seminar and praxis formats addressing selected issues and their applications to dance instruction. (1-3 sem. hrs.; 9 hrs. maximum.)

**MODA 60150 Advanced Choreographic Studies.** Advanced study of choreographic concepts, techniques and applications. Course work includes research of style and form, development of choreographic material, and a public presentation of the work, (1-3 hrs per sem.; 9 hrs. maximum.)

**MODA 60160 Dance History: Issues and Analysis.** Targeted study of developments in dance seen from social, anthropological, political, philosophical and/or artistic perspectives culminating in an in-depth project or research paper selected in consultation with instructor. (1-3 hrs. per sem.; 9 hrs. maximum.)

**MODA 60200 Modern Dance Technique.** Advanced technique of modern dance. (3-18 sem. hrs.; 3 hrs. maximum per semester.)

**MODA 60320 Ensemble and Performance III.** Prerequisite: Permission of instructor. Advanced technique and ensemble training. (3-9 sem. hrs.; 3 hrs. maximum per semester.)

**MODA 60900 Research Problems in Theatre, Ballet and/or Modern Dance.** Individual study in theatre, ballet and/or modern dance. (1-9 sem. hrs.)

**MODA 70980 Projects.** Projects.

**MODA 70990 Thesis.** Thesis

# Music

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[Master of Music in Voice \(Pedagogy Emphasis\)](#)

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## Overview

Degree programs may be pursued in Master of Music with emphasis in performance, pedagogy, musicology, theory/composition and Master of Music Education.

**Prerequisites:** Bachelor of Music degree or its equivalent with a major in the area of proposed graduate study, including sophomore-level credit in an approved foreign language in the case of prospective majors in musicology or theory/composition.

Students majoring in performance **must** present a satisfactory audition prior to admission, letters of recommendation and a statement of professional experience and goals. The audition should be in person when possible. In exceptional circumstances a tape recording will be acceptable.

Students applying in the areas of Musicology, Theory/Composition, and Music Education are required to submit acceptable GRE scores prior to admission. Students applying for admission to all other programs are not required to take the GRE, but are strongly encouraged to do so and submit scores prior to admission. The test scores, along with other materials, provide valuable information aiding in the evaluation and placement of students.

**All entering graduate students are required to take placement examinations during the first week of residency and must satisfy keyboard and theory proficiencies. ALL portions of the test must be satisfactorily completed prior to admission to candidacy.**

Students majoring in musicology or theory/composition must submit examples of scholarly or creative work prior to admission. Scholarly papers, compositions (scores and tapes) and original computer programs are appropriate.

Every graduate student must participate in an ensemble for a minimum of two semesters during residency. In special circumstances, related to stipend or assistantship, ensemble participation may be required for additional semesters.

## School Facilities

The School of Music is housed in TCU's Ed Landreth Hall and the Mary D. and F. Howard Walsh Center for the Performing Arts. The Ed Landreth building includes teaching, practice, and rehearsal facilities and a 1200-seat auditorium with superb acoustics. It is known for its association with the Van Cliburn International Piano Competition. Numerous pianos, many of them grands, four pipe organs, two harpsichords, a clavichord, a collection of authentic Baroque instruments, the Upchurch Studio for Electro-Acoustic Music, and other instrumental collections serve the school.

The Mary D. and F. Howard Walsh Center for the Performing Arts houses; a 325-seat recital hall of unprecedented design for outstanding acoustics; an instrumental rehearsal hall; a choral rehearsal hall; and a piano wing furnished exclusively with Steinway pianos. The piano wing includes: five teaching studios, eight practice rooms, and an electronic piano laboratory.

A large, comprehensive music library complete with recordings, reference books, texts, scores, and listening rooms is housed in the Mary Coats Burnett Library.

## Graduate Program

**Performance majors** must earn 30-34 hours in approved graduate courses, including at least 12 hours in studio instruction, and present two recitals, the content and format of which shall be determined and evaluated by the student's graduate advisory committee.

**Pedagogy, musicology and theory/composition majors** must earn 34-36 hours in approved graduate courses, with at least half of the courses, including thesis where appropriate, in the principal field.

The **Piano Pedagogy** curriculum is designed to provide advanced training in the field of piano pedagogy by preparing students to teach studio and class piano, conduct research in their field, write papers suitable for publication and present lectures and workshops on pedagogical topics.

A comprehensive oral examination must be passed before the completion of all programs. This examination is given

after the final recital or project is completed.

## Degree Programs

### Master of Music in String Performance

<i>Performance</i>	
MUSP 60310-60360 (Lessons)	12
MUSI 60120 (Orchestra)	2
MUSI 60080 (Chamber Music)	1
MUSP 70971 (Recital I)	1
MUSP 70981 (Recital II)	1
<i>Musicology</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
Electives in Music History	3
<i>Music Theory</i>	
MUSI 50203 (Structure and Style)	3
Electives in Music Theory	3
<i>Electives</i>	3
Total	32

### Master of Music Education

**Music Education** majors must earn a minimum of 32 hours in approved graduate courses, with at least half of the courses, where appropriate, in the principal field of instrumental, choral or general music. This degree is designed to strengthen musical scholarship and performance, to promote philosophical and psychological understanding in music education, and to provide opportunities to explore specific interests of the individual student through special topics courses.

#### *Music Education*

MUSI 60913 (Psychology of Music)	3
MUSI 60923 (Philosophy of Music Education)	3
MUSI 60300 (Special Problems in Music Education)*	6
Education Courses	6
<i>Musicology</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
<i>Theory</i>	
MUSI 50523 (Linear Analysis) or MUSI 60553 (Analysis of Contemporary Music)	3
<i>Performance</i>	
MUSP 60110-60710 (Studio)**	3-6
MUSI 60010-60210 (Ensemble)	1
<i>Electives***</i>	1-4
Total	32

\* A comprehensive oral examination follows submission of the final Special Problems Report.

\*\* With permission, students may take Performance for 6 semester hours, including a public recital.

\*\*\* Majors with keyboard concentration fulfill this two-semester requirement through Accompanying and Chamber Music Ensembles.

### Master of Music in Theory/Composition

It is possible to emphasize either theoretical, compositional or computer music studies. In each semester of the first year of study, prescribed courses will be taken, as well as courses in the emphasis area of choice.

#### First Year: Fall

MUSI 60800 (Theory Seminar)	3
MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60010-60210 (Ensemble)	0.5
Emphasis:	3
Theory: MUSI 60700 (Special Topics)	
Composition: MUSI 60630 (Composition)	
Computer Music: MUSI 60700 (Special Topics)	
Total	9.5

#### First Year: Spring

MUSI 50523 (Linear Analysis) or MUSI 60553 (Analysis of Contemporary Music)	3
MUSI 60500 (Musicology Seminar)	3
MUSI 60010-60210 (Ensemble)	0.5
Emphasis:	3
Theory: MUSI 60700 (Special Topics)	
Composition: MUSI 60630 (Composition)	
Computer Music: MUSI 60643 (Computer Music)	
Total	9.5

#### Second Year: Fall

MUSI 60800 (Theory Seminar)	3
MUSI 70980 (Thesis I)	3
Elective	3
Total	9

*Second Year: Spring*

MUSI 50523 (Linear Analysis) or	
MUSI 60553 (Analysis of Contemporary Music)	3
MUSI 70990 (Thesis II)	3
Electives	2
Total	8
TOTAL	36

**Master of Music in Piano Performance**

*Performance*

MUSP 60210 (Piano)	12
MUSI 60080-60210 (Ensemble)*	1
MUSI 70971 (Recital I)**	1
MUSI 70981 (Recital II)***	1

*Musicology*

MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 50433 (Keyboard Literature)	3

*Music Theory*

MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of Contemporary Music)	3

*Electives*

Total	30
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\* Piano majors fulfill this two-semester requirement through Piano Accompanying and/or Chamber Music.

\*\* Each of the two recitals shall be no less than 60 minutes in length. The first recital may, if desired, include a concerto with second piano accompaniment and/or chamber music; this portion, however, must be no more than half the length of the recital.

\*\*\* Two copies of a good quality tape recording of the final recital must be submitted to the Graduate School before the student can be cleared for graduation. This is the student's responsibility.

**Master of Music in Organ Performance**

*Performance*

MUSP 60220 (Organ)	12
MUSP 60080-60210 (Ensemble)	1
MUSP 70971 (Recital I)*	1
MUSP 70981 (Recital II)**	1

*Musicology*

MUSI 60103 (Bibliography & Research Techniques)	3
MUSI 50423 (Choral Literature) or MUSI 50970 (Special Studies: Hymnology)	3

*Music Theory*

MUSI 50523 (Linear Analysis)	3
MUSI 50203 (Musical Structure and Style)	3

*Electives\*\*\**

Total	32
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\*The recitals should be one hour in length. The first recital may be a lecture recital, or it could include ensemble or chamber music. However, this recital must include at least 30 minutes of solo performance.

\*\* Two copies of a good quality tape recording of the final recital must be submitted to the Graduate School before the student can be cleared for graduation. This is the student's responsibility. A comprehensive oral examination follows the final recital.

\*\*\*Recommended electives are MUSI 50212 (Choral Conducting) MUSI 60700 (Special Studies: Keyboard Harmony), and/or MUSI 50433 (Keyboard Literature).

**Master of Music in Piano Pedagogy**

*Performance*

MUSI 60210 (Piano)	8
MUSI 60080-60170 (Ensemble)*	1
MUSI 70971 (Recital)	1

*Pedagogy*

MUSI 60203 (Comprehensive Piano Pedagogy)	3
MUSI 60213 (Advanced Group Piano Pedagogy)	3
MUSI 60223 (Current Trends & Research in Piano Pedagogy)	3
MUSI 60913 (Psychology of Music)	3
MUSI 70973 (Lecture/Recital)	3

*Musicology*

MUSI 60103 (Bibliography & Research Techniques)	3
MUSI 50433 (Keyboard Literature)	3

*Music Theory*

MUSI 50523 (Linear Analysis)	3
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or MUSI 60553 (Analysis of Contemporary Music)	
Total	34

\* *Piano Pedagogy Majors fulfill this two-semester requirement through Accompanying and/or Chamber Music.*  
Piano Pedagogy Majors must pass the Keyboard Skills Exam or take Functional Piano (MUSI 20071 and 20081)

#### **Master of Music in Voice (Pedagogy Emphasis)**

<i>Performance</i>	
MUSP 60110 (Voice)	8
MUSI 60100; 60040 (Opera/Chorale)	2
MUSI 70971 (Recital)*	1
<i>Pedagogy</i>	
MUSI 50053 (Introduction to Voice Pedagogy)	3
MUSI 50063 (Comparative Voice Pedagogy)	3
MUSI 60052 (Voice Repertoire Management)	2
MUSI 60162 (Techniques for the Singer-Actor)	2
MUSI 60041 (Voice Pedagogy Practicum)**	1
<i>Musicology/Music Literature</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
Musicology/Music Literature Elective	3
MUSI 50413 (Opera Literature),	
MUSI 50423 (Choral Literature),	
MUSI 50463 (20th Century Literature),	
MUSI 50473 (Song Literature),	
or MUSI 60500 (Seminar in Musicology)	
<i>Music Theory</i>	3
MUSI 50523 (Linear Analysis),	
MUSI 60553 (Analysis of Contemporary Music),	
or MUSI 60800 (Seminar in Music Theory)	
<i>Electives</i>	3
Chosen from graduate courses in Music or related academic fields. Recommendations may be made on the basis of undergraduate transcript and placement examinations.	
Total	34

\* The recital shall be no less than 60 minutes in length, not including intermission. Two copies of a good quality recording of the final recital must be submitted to the Graduate School before the student can be cleared for graduation. This is the student's responsibility.

\*\* *Voice Pedagogy Practicum may be repeated for elective credit.*

#### **Master of Music in Voice (Performance Emphasis)**

<i>Performance</i>	
MUSP 60110 (Voice)	8
MUSI 60100; 60040 (Opera/Chorale)	2
MUSI 70971 (Recital I)*	1
MUSI 70981 (Recital II)*	1
<i>Pedagogy</i>	
MUSI 50053 (Introduction to Voice Pedagogy)	3
MUSI 60052 (Voice Repertoire Management)	2
MUSI 60162 (Techniques for the Singer-Actor)	2
<i>Musicology/Music Literature</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
Musicology/Music Literature Elective	3
MUSI 50413 (Opera Literature),	
MUSI 50423 (Choral Literature),	
MUSI 50463 (20th Century Literature),	
MUSI 50473 (Song Literature),	
or MUSI 60500 (Seminar in Musicology)	
<i>Music Theory</i>	
MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of Contemporary Music)	
or MUSI 60800 (Seminar in Music Theory)	
<i>Electives</i>	3
Chosen from graduate courses in Music or related academic fields. Recommendations may be made on the basis of undergraduate transcript and placement examinations.	
Total	34

\* Each recital shall be no less than 60 minutes in length, not including intermission. A major operatic role may be substituted for one of the recitals. Two copies of a good quality recording of the final recital must be submitted to the Graduate School before the student can be cleared for graduation. This is the student's responsibility.

#### **Master of Music in Wind and Percussion Performance**

<i>Performance</i>	
MUSP 60310-60710 (Performance)	12

MUSI 60010-60210 (Ensemble)*	1
MUSI 70971 (Recital I)	1
MUSI 70981 (Recital II) **	1
<i>Musicology</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60500 (Seminar in Musicology)	3
<i>Music Theory</i>	
MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of Contemporary Music)	
<i>Electives</i>	
	3
Total	30

\*This is a two-semester requirement.

\*\* A good quality tape recording of the final recital must be submitted in two copies to the Graduate School, before the student may be cleared for graduation. This is the student's responsibility.

A comprehensive oral examination follows the final recital.

### Master of Music in Musicology

#### *Music History Courses*

MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60500 (Seminar in Musicology)	3
MUSI 70950 (Special Studies: Comp. Exam. Prep.)	1
MUSI 70980 (Thesis I)	3
MUSI 70990 (Thesis II)	3
<i>Three additional history courses</i>	9

#### *Three additional history courses*

MUSI 50303 (History of Sacred Music),	
MUSI 50403 (Symphonic Literature),	
MUSI 50413 (Opera Literature),	
MUSI 50423 (Choral Literature),	
MUSI 50433 (Keyboard Literature),	
MUSI 50443 (Ethnomusicology),	
MUSI 50453 (Music Criticism),	
MUSI 50463 (Music of the 20 Century),	
MUSI 50473 (Song Literature),	
MUSI 50483 (Chamber Music Literature), or	
MUSI 50493 (Music in the United States)	

#### *Other Requirements*

MUSI 60800 (Seminar in Music Theory)	3
MUSI 50203 (Musical Structure and Style), MUSI 50523 (Linear Analysis), or MUSI 60553 (Analysis of Contemporary Music)	3
Ensemble (60010-60210)	1
<i>Electives</i>	3
Chosen from graduate level courses (Musicology, Theory, or courses outside the school)	
Total	32

### Master of Music in Conducting

#### **Band Conducting Emphasis**

#### *Music Theory*

MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of Contemporary Music)	3

#### *Musicology*

MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60500 (Seminar in Musicology)	3

#### *Conducting*

MUSI 50222 (Instrumental Conducting)	2
MUSI 60232 (Score Reading)	2
MUSI 50970 (Special Topics - Band Literature)	3
MUSI 60220 (Special Studies in Conducting)	4

#### *Performance*

MUSP 60410 -60610(Lessons)	4
MUSP 70971 (Recital I)*	1
MUSP 70981* (Recital II)	1

#### *Electives*

Chosen from graduate courses in music or related academic fields	3
TOTAL	32

\* Conducting majors participate as conductors in at least two public performances with major university ensembles. Each candidate for the Master of Music in Conducting must submit two copies of good quality audio and video tape recordings of both recital appearances to the Graduate Studies Office before the student can be cleared for graduation.

#### **Choral Conducting Emphasis**

<i>Music Theory</i>	
MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of contemporary music)	
<i>Musicology</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60500 (Seminar in Musicology)	3
<i>Conducting</i>	
MUSI 50212 (Choral Conducting)	2
MUSI 60232 (Score Reading)	2
MUSI 50423 (Choral Literature)	3
MUSI 60220 (Special Studies in Conducting)	4
<i>Performance</i>	
MUSP 60110 (Voice)	4
MUSP 70971 (Recital I)*	1
MUSP 70981 (Recital II)*	1
<i>Electives</i>	
Chosen from graduate courses in music or related academic fields	3
TOTAL	32

\* Conducting majors participate as conductors in at least two public performances with major university ensembles. Each candidate for the Master of Music in Conducting must submit two copies of good quality audio and video tape recordings of both recital appearances to the Graduate Studies Office before the student can be cleared for graduation.

### **Orchestral Conducting Emphasis**

<i>Music Theory</i>	
MUSI 50523 (Linear Analysis)	3
MUSI 60553 (Analysis of Contemporary Music)	3
<i>Musicology</i>	
MUSI 60103 (Bibliography and Research Techniques)	3
MUSI 60500 (Seminar in Musicology)	3
<i>Conducting</i>	
MUSI 50222 (Instrumental Conducting)	2
MUSI 60232 (Score Reading)	2
MUSI 50403 (Symphonic Literature)	3
MUSI 60220 (Special Studies in Conducting)	4
<i>Performance</i>	
MUSP 60310-60810 (Applied Lessons)	4
MUSP 70971 (Recital I)*	1
MUSP 70981 (Recital II)*	1
<i>Electives</i>	
Chosen from graduate courses in music or related academic fields	3
TOTAL	32

\* Conducting majors participate as conductors in at least two public performances with major university ensembles. Each candidate for the Master of Music in Conducting must submit two copies of good quality audio and video tape recordings of both recital appearances to the Graduate Studies Office before the student can be cleared for graduation.

### **Master of Music in Conducting**

<i>Semester I</i>	
Core Course in Theory or Musicology	3
MUSI 50523(Linear Analysis), 60553 (Analysis of Contemporary Music), 60103 (Bibliography and Research Techniques), or 60500 (Seminar in Musicology)	
MUSI 50222 (Instrumental Conducting), or 50212 (Choral Conducting)	2
Lessons	2
MUSI 60220 (Special Studies in Conducting)	1
Total	8
<i>Semester II</i>	
Core Course in Theory or Musicology	3
MUSI 60232(Score Reading)	2
Lessons	2
MUSI 60220 (Special Studies in Conducting)	1
Total	8
<i>Semester III</i>	
Core Course in Theory or Musicology	3
MUSI 50970 (Special Problems - Band Literature), MUSI 50403 (Orchestral Literature), or MUSI 50423 (Choral Literature.)	3
MUSI 60220 (Special Studies in Conducting)	1
MUSI 70971 (Recital I)	1
Total	8

<i>Semester IV</i>	
Core Course in Theory or Musicology	3
MUSI 60220 (Special Studies in Conducting)	1
Elective	3
MUSI 70981 (Recital II)	1
Total	8
TOTAL	32

### Artist Diploma in Piano

The Artist Diploma is a program for the most advanced and gifted young performers who, by their performance and credentials, demonstrate that they have serious potential to become concert artists. The program is designed to provide intensive study and performance opportunities under the guidance of master teachers in preparation for a concert career. An audition for the piano faculty is required. Admission to the program is allowed only upon the recommendation of the piano faculty and the approval of the Director of the School of Music. The Artist Diploma is a three-year program. No extensions will be granted. A minimum of 3.0 is required to maintain satisfactory academic progress in this program.

MUSP 40210 (Piano)	26
MUSP 30991, 40971, 40981, 40991 (Recitals)	4
MUSP 10271, 10281 (Accompanying)	2
MUSI 30970 (Directed Study in Music)	4
Total	36

**The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.**

### Courses of Instruction

**MUSI 50053 Introduction to Voice Pedagogy.** Prerequisite: Appropriate undergraduate degree in Music or Music Education or permission of instructor. Introduction to science, methods, and materials of voice pedagogy. Acoustics, breathing, attack, registration, resonance, vowels, articulation, and coordination of singing.

**MUSI 50063 Comparative Voice Pedagogy.** Prerequisite: 50053 or equivalent and permission of instructor. Comparisons of research results and concepts of voice pedagogy across national styles, bel canto treatises, 19th century sources, contemporary methods, and artist statements. Students are encouraged to develop their own practical studio procedures in harmony with the common ideals of Western artistic voice culture.

**MUSI 50203 Musical Structure and Style.** Study of musical style and structure through the analysis of music; organized chronologically from 1750 to the present.

**MUSI 50212 Choral Conducting.** Prerequisites: Senior or graduate standing, 30512 or 30522, keyboard facility or permission of instructor. Materials and techniques for the experienced choral director.

**MUSI 50222 Instrumental Conducting.** Prerequisite: 30522; keyboard facility; or permission of instructor. Baton technique and its application to selected works of symphonic and operatic literature.

**MUSI 50303 History of Sacred Music.** Prerequisite: Junior or Senior standing or permission of instructor. An historical survey of sacred music from ancient times to the twentieth century.

**MUSI 50403 Symphonic Literature.** Prerequisite: Senior or graduate standing. Selected works for orchestra and band, illustrating development of the symphony.

**MUSI 50413 Operatic Literature.** Prerequisite: Graduate standing or approved seniors with Music 30613, 30623. Operatic masterpieces from 1600 to the present with emphasis on selected works of Mozart, Verdi, Wagner, Puccini, Britten and others.

**MUSI 50423 Choral Literature.** Prerequisite: Graduate standing or approved seniors with Music 30613, 30623. The various forms in the field of choral literature with detailed examination of representative works.

**MUSI 50433 Keyboard Music.** Prerequisite: Senior or graduate standing. History of development of organ from earliest evidence, harpsichord, clavichord, forte-piano, the piano as well as development of music for these instruments. Keyboard forms and styles with emphasis on earliest developments.

**MUSI 50443 Ethnomusicology.** Prerequisite: Senior or graduate standing. The study of various theories concerning the cultural function of music, exposure to the analytical methods of ethnomusicologists, and the examination of examples from diverse musical cultures.

**MUSI 50453 Music Criticism.** Prerequisite: Senior or graduate standing. Study of selected writings on music criticism and aesthetics from antiquity to the present.

**MUSI 50463 Music in the Twentieth Century.** Prerequisite: Senior or graduate standing. Study of the main trends from the time of Ravel to the present.

**MUSI 50473 Song Literature.** Prerequisite: Senior or graduate standing. An examination of the repertoire for solo voice from 1750 to the present, with emphasis on the works of German,

**MUSI 50483 Chamber Music Literature.** Prerequisite: Graduate standing or approved seniors with Music 30613, 30623. Consent of instructor. The study of the development of chamber music from its beginnings to the present.

**MUSI 50493 Music in the United States.** Prerequisite: Senior or graduate standing. An examination of both



cultivated and vernacular music in the United States from the Colonial Era to the present.

**MUSI 50523 Linear Analysis.** Prerequisite: Graduate standing or approved seniors. Development of structural learning through graphic analysis. Readings on Schenkerian concepts as applied to tonal music.

**MUSI 50970 Special Problems.** Prerequisite: Permission of instructor. Specialized work in student's area of concentration. 1-6 hours.

**MUSI 60000 Music Pedagogy.** Methods and materials for teaching at various levels, to include supervised teaching.

**MUSI 60041 Voice Pedagogy Practicum.** Prerequisites: MUSI 50053. Experience in individual voice instruction under the supervision of a faculty advisor. Each student will teach two voice pupils weekly lessons for the semester and observe lessons taught by university faculty. A weekly class serves as a forum for pedagogical discussion and exchange of ideas. The course may be repeated for a maximum of three credit hours.

**MUSI 60052 Voice Repertoire Management.** Prerequisite: Knowledge of Italian, German and French dictions and the International Phonetic Alphabet (IPA) and some proficiency in piano accompanying. Survey of the repertoire for voice performance and its relationship to voice classification, age, technical level and performance situation. Students will learn to coach various national styles and performance practices.

**MUSI 60062 Research in Singing.** Prerequisites: MUSI 50053, 50063 and permission of instructor. Surveys the literature of research in singing, including topics such as aerodynamics, vocal registers, vibrato, formants, intelligibility, voice classification, vocal abuse and misuse, fitness for singers and the psychology of singing. Students also become familiar with the instrumentation for physiologic and psychoacoustic studies and the principles of experimental design.

**MUSI 60103 Bibliography and Research Techniques.** Prerequisites: Graduate standing. A course in the basic materials and methods of research in music. Acquaintance with primary source materials such as music lexicons, dictionaries, monuments, complete works of composers, periodical literature and evaluation of standard sources in all areas of music.

**MUSI 60150 New Music Ensemble.** The ensemble performs mixed chamber music composed during the past 100 years with emphasis upon works of the past 25 years.

**MUSI 60162 Techniques for the Singer-Actor.** Development of performance techniques unique to music theatre genre. Examination and practical application of skills and knowledge required for producing/directing music theatre.

**MUSI 60182 Piano Chamber Music Performance.** Prerequisite: Graduate standing in music. Intensive study of selected works of chamber music with piano. Emphasis on developing the musical and interactive skills needed for chamber music through rehearsal and performance. Weekly coaching with faculty.

**MUSI 60203 Comprehensive Piano Pedagogy.** Extensive examination of a comprehensive approach to piano pedagogy which combines reading, technique, theory, music history, improvisation, and the mastery of functional keyboard skills. Includes an historical overview of piano pedagogy and exploration of various learning theories.

**MUSI 60213 Advanced Group Piano Pedagogy.** Class piano laboratory technology, text selection, student placement, curriculum development, testing and grading. Includes observation and actual classroom experience gained as teaching assistants.

**MUSI 60220 Special Studies in Conducting.** Prerequisite: Admission to the Master of Music in Conducting degree program and/or permission of the instructor. An intensive study of the technique and philosophy of conducting with the student's major professor. Required of all students in the Master of Music in Conducting degree during each semester of study in the program. One hour of credit each semester for a maximum of four credits.

**MUSI 60223 Current Trends and Research in Piano Pedagogy.** Reading and writing assignments which explore the body of knowledge in the field of piano pedagogy, with emphasis on recent research studies. Selection and development of a research topic for the lecture/recital.

**MUSI 60232 Score Reading.** Prerequisite: Admission into the Master of Music in Conducting degree program or permission of instructor. Further development of skills in the reading of all clefs and the most common transpositions and structured analysis of large scores. Score analysis and the simultaneous reading of multiple lines in both full and condensed scores.

**MUSI 60300 Special Problems in Music Education.** Special Problems in Music Education.

**MUSI 60500 Seminar in Musicology.** Prerequisite: Graduate standing in music, consent of instructor.

**MUSI 60553 Analysis of Contemporary Music.** Prerequisite: Graduate standing. An analysis of 20th Century compositions, with emphasis on atonal music. Study of contemporary compositional techniques and pitch-class analysis. Readings on set analysis and recent developments in contemporary composition.

**MUSI 60630 Composition.** Prerequisite: Permission of instructor. Study of compositional methods. The course may be taken twice for 6 total hours with a maximum load of 3 hours per semester.

**MUSI 60643 Computer Music.** Prerequisite: Permission of instructor. An investigation of basic acoustic and electronic principles, psychoacoustics, synthesis fundamentals, synthesis using distortion techniques, subtractive synthesis, speech synthesis, reverberation, auditory localization and other sound processing techniques, aleatoric and deterministic composition with computers and real-time performance of computer music.

**MUSI 60700 Special Studies in Music Theory.** Prerequisites: Graduate standing in music, consent of instructor. Special topics in the theory of music, affording students an opportunity to carry on individual programs of study.

**MUSI 60800 Seminar in Music Theory.** Seminar in music theory.

**MUSI 60913 Psychology of Music.** The study of the sociological and psychological aspects of music as well as musical aptitude, human learning theory and theories of music learning.

**MUSI 60923 Philosophy of Music Education.** A study of the concepts involved in the philosophy of music education with respect to the place of music as a moral, social and cultural force.

**MUSI 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**MUSI 70950 Special Problems in Musicology.** Prerequisite: Graduate standing in music; consent of instructor. Special topics in the history of music, affording students an opportunity to carry on individual programs of study.

**MUSI 70971 Recital I.** Recital I.

**MUSI 70973 Lecture Recital.** Preparation and delivery of a lecture-recital on a pedagogical topic. Culminates in a major paper and a large-scale workshop presentation. Extraction of an article suitable for publication.

**MUSI 70981 Recital II.** Recital II.

**MUSP 70971 Recital I.** Recital I

**MUSP 70981 Recital II.** Recital II

**Graduate Studio Instruction**

Variable credit, 1-3 hours per semester

*Vocal Studies*

**MUSP 60110 Voice.** Voice

*Keyboard Studies*

**MUSP 60210 Piano.** Piano

**MUSP 60220 Organ.** Organ

**MUSP 60230 Jazz Piano.** Jazz Piano

**MUSP 60240 Harpsichord.** Harpsichord

*Band/Orchestral Instrument Studies*

**MUSP 60310 Violin.** Violin

**MUSP 60320 Viola.** Viola

**MUSP 60330 Violoncello.** Violoncello

**MUSP 60340 Double Bass.** Double Bass

**MUSP 60360 Jazz Bass.** Jazz Bass

**MUSP 60410 Flute.** Flute

**MUSP 60420 Oboe.** Oboe

**MUSP 60430 Clarinet.** Clarinet

**MUSP 60440 Saxophone.** Saxophone

**MUSP 60450 Bassoon.** Bassoon

**MUSP 60510 French Horn.** French Horn

**MUSP 60520 Trumpet.** Trumpet

**MUSP 60530 Trombone.** Trombone

**MUSP 60540 Baritone.** Baritone

**MUSP 60550 Tuba.** Tuba

**MUSP 60560 Euphonium.** Euphonium

**MUSP 60610 Percussion.** Percussion

**MUSP 60620 Jazz Drumset.** Jazz Drumset

**MUSP 60710 Harp.** Harp

**MUSP 60810 Guitar.** Guitar

**MUSP 60910 Jazz Guitar.** Jazz Guitar

*Graduate Ensembles*

**MUSI 60010 Wind Symphony.** 1/2 sem. hr.

**MUSI 60020 Percussion Ensemble.** 1/2 sem. hr.

**MUSI 60030 Choral Union.** 1/2 sem. hr.

**MUSI 60040 Concert Chorale.** 1/2 sem. hr.

**MUSI 60050 Chapel Choir.** 1/2 sem. hr.

**MUSI 60060 Chamber Singers.** 1/2 sem. hr.

**MUSI 60070 Vocal Jazz.** 1/2 sem. hr.

**MUSI 60080 Chamber Music.** 1/2 sem. hr.

**MUSI 60090 Woodwind Ensemble.** 1/2 sem. hr.

**MUSI 60100 Opera Theatre.** 1/2 sem. hr.

**MUSI 60110 Marching Band.** 1/2 sem. hr.

**MUSI 60120 Symphony Orchestra.** 1/2 sem. hr.

**MUSI 60160 Brass Ensemble.** 1/2 sem. hr.

**MUSI 60170 Piano Accompanying.** 1/2 sem. hr.

**MUSI 60180 Collegium Musicum.** 1/2 sem. hr.

**MUSI 60190 Jazz Ensemble.** 1/2 sem. hr.

**MUSI 60210 Symphonic Band.** 1/2 sem. hr.

# Theatre Arts

## [Courses of Instruction](#)

### Overview

NOTE: Program under review. No new applications accepted.

### Master of Arts Degree

**Prerequisites:** Bachelor's degree or its equivalent with a major in theatre, letters of recommendation and a statement of professional experience and goals. Sophomore-level language credit is required if the applicant's proposed research area requires a reading knowledge of a foreign language, to be determined by the graduate faculty of the Department of Theatre. This requirement may be fulfilled by satisfactorily completing a second-year language course, or by receiving a fifty-percentile grade on the Graduate School Foreign Language Test administered by ETS.

**Graduate Program:** At least 30 approved hours, including 15 in Theatre, 6 in Thesis and 9 in an approved field other than Theatre. Students will normally take most of their course work in theatre history and criticism, though some may wish to pursue a general studies curriculum in Theatre. The program will culminate in a historical, descriptive, critical or experimental written thesis students in the M.A. program are not permitted to do a thesis production.

### Master of Fine Arts Degree

**Prerequisites:** Bachelor's degree or its equivalent with a major in theatre, letters of recommendation and a statement of professional experience and goals, in addition to meeting the minimum admission requirements at TCU. Candidates are also expected to indicate an area of specialization: Acting, Directing, Costume Design, Scene Design/Lighting.

**Graduate Program:** At least 45 approved hours, 6 in Thesis, and 36 in Theatre courses, 18 of which must be in one of the above areas of specialization.

**Degree Candidacy:** The M.F.A. is considered to be a terminal professional degree and the student is required to indicate an area of specialization (above) no later than the first semester of residence, accompanied by documentary evidence indicating the qualifications for pursuing that specialization. During the first year of residence the candidate is required to present a qualifying project in his area of specialization, the nature of which will be determined by the faculty. The candidate will culminate his studies with a production thesis in one of the above areas of specialization.

### Courses of Instruction

**THEA 50300 Problems in Acting.** Prerequisite: Permission of instructor. Projects in acting utilizing scenes or roles for study and performance. 1-6 semester hours.

**THEA 50400 Problems in Directing.** Prerequisite: Permission of instructor. Individual projects for the advanced study of directing. 3-6 semester hours.

**THEA 50600 Problems in Scenography.** 3-6 sem. hrs.)

**THEA 50623 Advanced Stage Lighting.** The functions of stage lighting. Lighting theory through the twentieth century. Lighting control from the simplest forms to the state-of-the-art controls. Includes practical application of color theory, design and distribution.

**THEA 50700 Problems in Costuming and Makeup.** Individual or class projects in one area: costume design, costume research, makeup prosthetics/mask construction, wig making, rendering techniques, plastics and elastic; jewelry making. 3-6 hours.

**THEA 50733 Advanced Pattern Drafting.** Techniques in drafting complex period and other costume patterns for the stage.

**THEA 50743 Advanced Costume Design.** Prerequisite: 50733. Practicum in the techniques of design and rendering.

**THEA 50800 Theatre Internship.**

**THEA 50803 Theatre Management.** The administrative and fiscal techniques of managing performing arts groups.

**THEA 60300 Problems in Advanced Acting.** Problems in acting, emphasizing special needs of advanced students. Material drawn from particular playwrights in varying styles. (3-12 semester hours).

**THEA 60400 Problems in Advanced Directing.** Special full length directing projects under guidance of directing faculty. (3-12 semester hours.)

**THEA 60500 Problems in Theatre History and Criticism.** Prerequisite: 50503, 50513 or permission of instructor. Research studies in special phases of theatrical history or criticism. (3-6 semester hours.)

**THEA 60600 Problems in Advanced Scenography.** Seminar and/or practicum on independent or group basis, covering specialized areas in technical theatre. (3-12 semester hours)

**THEA 60650 Production Design Practicum.** An opportunity for the advanced student to participate on the University Theatre production staff. The student may elect up to six credit hours in any one field. (3-12 semester hours.)

**THEA 60700 Advanced Problems in Costume and Makeup.** Special research or creative problems in costuming or make-up. (3-12 semester hours.)

**THEA 60800 Theatre Internship.** Prerequisite: Permission of the department. Practical off-campus experience in various phases of theatre production and management. (1-12 sem. hrs. No more than 12 hours may be taken in a combination of 30800 and 60800.)

**THEA 60900 Research Problems in Theatre.** Individual research projects in theatre. (3-6 semester hours.)

**THEA 70980 Thesis.** Thesis

**THEA 70990 Thesis.** Thesis

## College of Health and Human Sciences

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### Overview

In addition to other graduate programs, the College of Health and Human Sciences offers degrees in Master of Science in Nursing and Master of Science. Two departments have majors leading toward the Master of Science degree, Communication Sciences and Disorders and Kinesiology.

# Harris School of Nursing

## Courses of Instruction

### Overview

Harris School of Nursing offers a Masters of Science in Nursing that prepares Adult (Medical-Surgical) Clinical Nurse Specialists. The program prepares nurses who have earned either an associates degree in nursing or a baccalaureate degree in nursing for the advanced practice role. The master's program requires completion of 40 hours of coursework comprised of 31.5 semester hours of didactic and 8.5 semester hours (510 clinical hours) of clinical practicum.

### Admission

Admission to the graduate program is open to qualified candidates who have a baccalaureate degree in nursing from an accredited college or school of nursing and candidates who have an associate degree in nursing from an accredited college of nursing and have successfully completed the accelerated ADN to master's program course work. Admission is competitive and an individualized approach is used to identify applicants with demonstrated academic achievement and potential, who have strong motivation to succeed in academic study and professional practice, and the potential to function as a leader in advanced practice and health care delivery. The applicant's grade point average, performance on standardized exams, writing and speaking skills, and prior professional experience are used to assess these qualities. A profile of each applicant is developed based on an admission portfolio consisting of:

- Evidence of current licensure in the state of Texas or the state where clinical course work will occur.
- Evidence of current Healthcare Provider CPR, liability insurance, health clearance.
- Official transcripts from all colleges or universities attended with a preferred cumulative grade point average of 3.0 (on a 4 point scale) from the applicant's basic nursing program.
- For baccalaureate graduates, an acceptable score on the verbal, quantitative, and analytical sections of the Graduate Record Examination (GRE) or the Miller Analogy Test (MAT).
- For non-baccalaureate graduates, an acceptable score on the GRE or the MAT are required as above for progression to the graduate level course sequence.
- A preferred work history that includes two years of full-time experience or its equivalent as a registered nurse in medical-surgical or other areas where adults receive care.
- For applicants for whom English is a second language, demonstrated English language proficiency is measured by an acceptable score on the Test of Spoken English as a Foreign Language (TOEFL) and the institutional version of the Test of Spoken English (TSE).
- An assignment demonstrating written communication skills and computer proficiency. -- Three letters of reference, of which two are from health care professionals and the third one preferably from an instructor in the basic nursing program.

### Graduate Curriculum Requirements

The curriculum is composed of 31.5 semester hours of didactic coursework and 8.5 semester hours of clinical practicum. An additional 4-semester-hour elective course in diagnostic reasoning will be offered to meet requirements for prescriptive authority, which Clinical Nurse Specialist may obtain in some states.

### Required Coursework

- NURS 50003** - *Advanced Pathophysiology*
- NURS 50013** - *Advanced Health Assessment*
- NURS 50053** - *Advanced Pharmacotherapeutics*
- NURS 60013** - *Health Care Policy, Law, and Ethics*
- NURS 60022** - *Advanced Practice Roles*
- NURS 60030** - *Research Project*
- NURS 60043** - *Advanced Nursing Research and Theory*
- NURS 60413** - *CNS Concepts I*
- NURS 60443** - *Financial Concepts in Health Care*
- NURS 60482** - *CNS Practicum I*
- NURS 60513** - *CNS Concepts II*
- NURS 60583** - *CNS Practicum II*
- NURS 60613** - *CNS Concepts III*
- NURS 60684** - *CNS Practicum III*

### Elective Coursework

- NURS 60714** - *Diagnostic Reasoning*

### The ADN to MSN Program

The Master's of Science in nursing program offers the opportunity for associate degree registered nurses (ADN) to achieve master's level preparation in nursing through an innovative curriculum plan. The ADN candidate is admitted to the accelerated program and required to complete a number of prerequisites before consideration for admission to the graduate program. The prerequisites include:

Liberal arts and humanities and college requirements 38 hours of lower division courses that are required may be

taken at TCU or transferred:

English . . . . .6 hours  
 Anatomy and Physiology. . . . .8  
 Microbiology 3 hours Psychology.....3  
 Growth and Development..... 3  
 Speech 3 hours Statistics .....3  
 Fine Arts/Humanities .....3  
 Foreign Language .....6

Twenty-four hours of upper division courses will be taken at TCU of which 12 hours are nursing:

NTDT 30123 Nutrition throughout the life cycle. ....3 hours  
 Upper division writing intensive course .....3  
 Upper division literature course..... 3  
 Upper division social science course .....3

Undergraduate nursing curriculum requirements: (12 credit hours)

NURS 30112 Nursing Research and Theory  
 NURS 30043 Survey of Professional Nursing  
 NURS 40813 Concepts of Community Health Nursing  
 NURS 48882 Practicum: Community Health Nursing NURS  
 40912 Concepts of Nursing Management and Leadership

Upon completion of all prerequisites with a TCU cumulative grade point average of 3.0, an acceptable score on the Graduate Record Examination (on verbal, quantitative, and analytical sections) or the Miller Analogy Test, the ADN student will be allowed to enroll in graduate level coursework. Students who fail to meet these conditions will not be allowed to continue on in graduate study in nursing, but may consider completion of the baccalaureate degree requirements.

#### Courses of Instruction

**NURS 50003 Advanced Pathophysiology.** Prerequisites: Admission to the Graduate Program or permission of the instructor. This course provides an understanding of advanced knowledge base of pathophysiologic processes underlying human illness. Content includes systems approach to pathophysiologic processes associated with altered health states in adults.

**NURS 50013 Advanced Health Assessment.** Prerequisites: Admission to the Graduate Program or permission of the instructor. This course provides an advanced level of skill in the assessment of adults. Content includes comprehensive advanced assessment of adults. Diagnostic and inferential skills are developed. During the clinical portion students will complete three detailed assessments of each individual system, culminating in one comprehensive systems assessment at course completion.

**NURS 50053 Advanced Pharmacotherapeutics.** Prerequisites: Admission to the Graduate Program or permission of the instructor. This course emphasizes the pharmacological principles fundamental to the selection of pharmacologic agents in altered health states. Content includes the pharmacodynamic, pharmacokinetic and pharmacotherapeutic properties of drug categories and specific agents, clinical responses to the use of pharmacologic agents, efficacy and cost-effectiveness issues, client education, adherence, and legal requirements of prescriptive authority.

**NURS 60000 Independent Study: Advanced Nursing Practice.** This course is designed to afford students the opportunity to focus on a phenomenon of interest in advanced nursing practice.

**NURS 60013 Health Care Policy, Law and Ethics.** Prerequisites: Admission to the Graduate Program or permission of the instructor if in a graduate program in another department. This course integrates concepts of health care policy, law and ethics as a foundation for high quality cost-effective care and for participation in the design and implementation of care in health care delivery systems. Content includes knowledge of how health policy is formulated, how to affect this process, and how it impacts clinical practice and health care delivery. Philosophical/ethical/legal dimensions of health care policy, organization and economics are analyzed.

**NURS 60022 Advanced Practice Roles.** Prerequisites: Admission to the Graduate Program. This course provides a foundation for the transition to the role of the nurse in advanced practice. Content includes roles within advanced practice, theories of change, concepts of negotiation, collaboration, interdependence, advocacy and autonomy, and titling, certification and licensure issues. The nurse practitioner and case manager roles will be extensively examined.

**NURS 60030 Research Project.** Prerequisites: NURS 60043. Research process is used to address a phenomenon of concern in health care. Emphasis is placed on the design and implementation of a study conducted within a specified area of advanced practice and strategies for disseminating results.

**NURS 60043 Advanced Nursing Research and Theory.** Prerequisites: Admission to the Graduate Program. This course emphasizes the evaluation, utilization and integration of a wide variety of theories and research methodologies as a foundation for advanced nursing practice. Content includes application of theoretical frameworks to research designs to improve practice and patient outcomes. Evidenced-based interventions are analyzed followed by identification of outcome studies needed to improve practice.

**NURS 60053 Critical Inquiry in Advanced Nursing Practice.** This course emphasizes the utilization of knowledge gained from the inquiry process to provide high quality health care, initiate change and improve health care delivery at all levels. Content includes the identification of clinical practice problems, evaluation of research in relation to those problems, application of the inquiry process to clinical issues as a basis for clinical and



organizational decision-making and the use of information technologies in inquiry and research.

**NURS 60413 CNS Concepts I.** Prerequisites: NURS 50003, 50013, 50053, 60043. This course emphasizes the patient/client domain of CNS practice. The health maintenance, health promotion, and illness prevention needs of adults, individually and collectively, are examined through the introduction and implementation of the outcomes management role. Content includes management of commonly encountered symptoms, functional problems, and risk behaviors commonly encountered in adults. The CNS subroles of expert practitioner, educator, researcher, change agent, and consultant are examined within the patient/client sphere of influence.

**NURS 60443 Financial Concepts in Health Care.** Prerequisites: NURS 60013. This course provides an overview of the financial concepts necessary to functioning as a case manager. Content includes financial accounting, planning and control, resource management, and management information systems.

**NURS 60444 Clinical Interpretation of Assessment and Diagnostic Data.** This course emphasizes the interpretation of multi-dimensional assessment data for the purpose of planning, implementing and evaluating a course of care for the client receiving case management services. The relationship between these data and the health and illness needs of clients is used to provide a basis for the service requirements needed to maintain and restore clients' optimal health.

**NURS 60482 CNS Practicum I.** Prerequisites: Concurrent NURS 60413. This course consists of supervised practicum experience in the application of health maintenance, health promotion and illness prevention needs of adults, as individuals and collectively. Particular emphasis is placed on the management of symptoms, functional problems, and risk behaviors commonly encountered in practice. The CNS subroles of expert practitioner, educator, researcher, change agent, and consultant are explored.

**NURS 60513 CNS Concepts II.** Prerequisites: NURS 60413 and 60482. This course explores the nursing personnel domain of CNS practice. Content is organized according to competencies related to identifying and defining problems and opportunities in nursing practice, identifying and articulating factors contributing to resource management needs and outcomes, developing innovative solutions, and evaluating the effect of solution strategies. The CNS subroles of expert practitioner, educator, researcher, change agent, and consultant are examined within the nursing personnel sphere of influence.

**NURS 60583 CNS Practicum II.** This course consists of supervised practicum experience in the nursing personnel domain of CNS practice. Particular emphasis is placed on identifying and defining problems and opportunities in nursing practice, identifying and articulating factors contributing to resource management needs and outcomes, developing innovative solutions, and evaluating the effect of solution strategies. The CNS subroles of expert practitioner, educator, researcher, change agent and consultant are explored.

**NURS 60613 CNS Concepts III.** Prerequisites: NURS 60413 and 60482, 60513 and 60583. This course explores the organizational/network domain of CNS practice. Content is organized according to competencies related to identifying and defining problems and opportunities in nursing practice, identifying and articulating resource management needs and factors contributing to outcomes, developing innovative solutions, and evaluating the effect of solution strategies. Strategies for working with ethnically diverse groups are included. The CNS subroles of expert practitioner, educator, researcher, change agent, and consultant are examined within organizational/network sphere of influence.

**NURS 60683 CNS Practicum III.** Prerequisites: Concurrent NURS 60613. This course consists of a supervised practicum experience in the organizational/network domain of CNS practice and a Capstone Experience integrating all of the CNS Spheres of Influence. During the first 3/4 of the semester, the organizational/network domain is explored. Particular emphasis is placed on identifying and defining problems and opportunities within organizations/networks, identifying and articulating factors contributing to resource management needs and outcomes within organizations/networks, developing innovative solutions within organizations/networks, and evaluating the effect of solution strategies within organizations/networks. Strategies for working with ethnically diverse groups are implemented. The CNS subroles of expert practitioner, educator, researcher, change agent, and consultant are explored. During the last 1/4 of the semester students have a Capstone Experience, a synthesis experience in which they must demonstrate competence performing as a CNS. Students are expected to function as a CNS by integrating all of the CNS Spheres of Influence and subroles. During the experience the preceptor will allow the student to function in his/her CNS role. The preceptor will serve as an evaluator of the student's performance. Students are expected to competently perform as CNS with little input from their preceptors.

**NURS 60716 Diagnostic Reasoning.** Prerequisites: NURS 50003, 50004, and 50053. This course emphasizes the diagnosis and management of the common acute and chronic disruptions of health experienced by adults. Students will assimilate knowledge from advanced assessment, advanced pathophysiology, and advanced pharmacotherapeutics to develop diagnoses and treatment plans within their scope of practice. Students will practice diagnostic and treatment skills in 6 hours of clinical practicum per week. This course completes the nationally recognized requirements that allow students to obtain prescriptive authority.

# Communication Sciences and Disorders

## [Courses of Instruction](#)

### Overview

Master of Science degree available in Speech-Language Pathology. The Master's degree program is fully accredited by the ASHA Council on Academic Accreditation.

### Speech-Language Pathology

**Prerequisites:** Bachelor's degree, including at least 24 hours in approved speech-language pathology courses.

Students must select course distributions that will allow for the completion of academic and clinical requirements for the ASHA, CCC-SLP. While the student must enroll for clinical practicum each semester, no more than 6 semester hours credit may be used to satisfy degree requirements. A minimum of 350 clock hours of clinical practice, 250 hours of which must be on the graduate level, is required.

**Plan I:** Minimum of 30 approved hours, including COSD 70323, 21 hours in speech-language pathology and 6 hours of thesis. A final comprehensive examination based on the thesis is required.

**Plan II:** Minimum of 36 approved hours, including COSD 70323, 27 hours in speech-language pathology and 6 hours selected with the advice of the major professor. A final comprehensive examination consisting of both written and oral portions is required.

**NOTE:** Both Plan I and Plan II include an optional sequence in bilingual speech-language pathology. Prerequisite for this sequence is native or near-native proficiency in English and Spanish.

**IMPORTANT:** Curriculum is currently under revision. Students are expected to check with graduate program advisers to determine currently available courses.

The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.

### Courses of Instruction

**COSD 50300 Clinical Practicum in Speech-Language Pathology II.** Prerequisite: 40300. Student must be recommended for enrollment by COSD faculty. A minimum of two semesters required for undergraduate students. A maximum of three semesters is allowed. Graduate students with less than 30 clinical hours will be considered for enrollment in COSD 50300. Supervised clinical experience in management of the most common speech and language disorders.

**COSD 50323 Counseling Special Populations and Their Families.** Prerequisite: Senior or graduate standing. Theories, principles and practices in counseling special populations and their families with a focus on the communicatively impaired. Appropriate counseling strategies and techniques are explored with practical application experiences included.

**COSD 50343 Advanced Aural Rehabilitation.** Prerequisite: Senior or graduate standing and 30343 and 30363 or permission of instructor. Theories of assessment and intervention in identification and aural rehabilitation of hearing-impaired and deaf children and adults. Includes methods of evaluation and training in the areas of audition, amplification, speech, language, speech-reading, assistive listening devices, cochlear implants, and communication modes and strategies.

**COSD 50350 Clinical Practicum in Audiology.** Prerequisites: Senior or graduate standing. Students must be recommended for enrollment by the Communication Disorders CD faculty. Such recommendations are based on the student's: 1) performance in COSD coursework with a grade of "C" or better expected in all COSD courses; and 2) previous clinical experience and performance with students expected to complete two semesters of COSD 40300 with a grade of "C" or better. A laboratory course in basic audiological testing techniques involving assessments and evaluation of the hearing function. 1-3 semester hours.

**COSD 50353 Psycholinguistics.** Prerequisite: Senior or graduate standing. Phonetics or permission of instructor. An introduction to the history, scope, problems, and present state of the psychology of language. Includes survey of theories and methods of investigation of several disciplines concerned with the scientific studies of language.

**COSD 50363 Seminar on Stuttering.** Prerequisite: Senior or graduate standing and permission of instructor. A study of fluency development and breakdown in children and adults. Descriptions and development of speech fluency, onset and development of stuttering, characteristics of stuttering and people who stutter, and theories of stuttering are reviewed.

**COSD 50373 Medical Aspects of Speech-Language Pathology.** Prerequisite: Senior or graduate level standing in speech-language pathology or permission of instructor. A study of the medical and biophysical bases of communication disorders and the relevant medical management of such issues as part of the total treatment program.

**COSD 50383 Seminar on Voice Disorders.** Prerequisite: Senior or graduate standing and permission of instructor. A study of theories, classification systems and etiologies, with emphasis on respiration, phonation, resonance and articulation factors as they relate to disorders of voice.

**COSD 50393 Basic Evaluative Instruments for Language Disorders.** Theory, administration and interpretation of basic evaluative instruments and indications for therapy.

**COSD 50970 Directed Studies in Communication Disorders.** Prerequisites: Senior or graduate standing; permission of instructor. Directed study focusing on specialized topic in communication sciences and disorders. (1-6 semester hours, 3 hours maximum per semester.)

**COSD 60300 Practicum in Speech-Language Pathology.** Prerequisites: Graduate standing in speech-language pathology and permission of instructor. Advanced clinical practice and evaluation of speech and language disorders. One semester hour required for each semester a student performs clinical practice up to six hours.

**COSD 60313 Motor Speech Disorders.** Prerequisites: Graduate standing in speech-language pathology. A study of the effects of neuropathology on motor speech performance skills. Etiology, symptomatology, evaluation, and treatment of motor speech disorders in children and adults are examined.

**COSD 60323 Evaluation and Diagnosis.** Prerequisites: Graduate standing in speech-language pathology and permission of instructor. A study of the theory, and some participation and observation of diagnostic teams working with speech and language problems.

**COSD 60333 Evaluation and Diagnosis: Minority Language Problems.** Prerequisites: Graduate standing in speech-language pathology and permission of instructor. Study of literature in standardized and nonstandardized methods of evaluating minority language populations. Course includes a lab.

**COSD 60343 Advanced Language Disorders in Children.** Prerequisites: Graduate standing in speech pathology and permission of instructor. Principles in the assessment and treatment of language disorders in infants, preschoolers, school-aged and adolescents.

**COSD 60353 Sociolinguistics.** Prerequisite: Graduate standing and consent of instructor. Study of social use of language by ethnically and culturally different individuals who speak a different language or dialect. Special emphasis will be given to the Mexican-American in the Southwest.

**COSD 60363 Orofacial Pathologies/AAC.** Prerequisite: COSD 30303 or permission of instructor. This two-part course includes study of the pathology of structure and function of the speech mechanism as related to cleft palate followed by a study of the use of augmentative and alternative technology for individuals with severe communication disorders.

**COSD 60373 Normal Language Development in Bilingual Populations.** Prerequisite: Graduate standing in speech-language pathology and/or consent of instructor. Study of theories of first and second language acquisition; childhood bilingualism, societal and individual influences on bilingualism, neurolinguistic, psycholinguistic and sociolinguistic aspects of bilingualism.

**COSD 60383 Advanced Study of Language and Language Development.** Intensive study and analysis of language in normal children at various developmental levels.

**COSD 60390 Seminar on Communication Disorders.** In depth study of a communication disorder. Seminar content may vary and may include such topics as dysphagia, organic disorders in children, assessment and treatment of voice disorders, and assessment and treatment of articulation disorders. Three hour maximum per semester.

**COSD 60393 Adult Neurolinguistic Disorders.** Prerequisites: Graduate standing in speech-language pathology. A study of the effects of neuropathology on the language skills of adults. Etiology, symptomatology, evaluation, and treatment of adult neurogenic language disorders including aphasia, dementia, right CVA, and traumatic brain injury are examined.

**COSD 60970 Directed Studies in Communication Disorders.** Prerequisites: Permission of instructor. Advanced study of specialized topic in communication sciences and disorders.

**COSD 70313 Assessment and Treatment of Stuttering.** Prerequisites: COSD 50363; senior or graduate standing. A study of the assessment and treatment of stuttering in preschool, school-aged, and adults who stutter. Assessment issues including behavioral and attitudinal analyses are reviewed. Differential treatment is discussed in terms of current therapies.

**COSD 70323 Research in Communication Sciences and Disorders.** A review of research design and evaluation in communication sciences and disorders. Emphasis on improved skills in both consuming and producing research in the fields of speech science, speech-language pathology and audiology.

**COSD 70343 Dysphagia.** Prerequisites: COSD 60313 and 60393; or permission of instructor. This course examines the etiology, symptomatology, evaluation, and treatment of swallowing disorders.

**COSD 70980 Thesis.** Thesis

**COSD 70990 Thesis.** Thesis

# Kinesiology

## [Courses of Instruction](#)

### Overview

#### Major in Kinesiology

The mission of the graduate program in Kinesiology is to provide students the opportunity to gain an in-depth understanding of the theoretical basis of human movement. Students are able to specialize in one of the subdisciplines within the kinesiological sciences; however, the departmental core curriculum also gives students a cross-disciplinary exposure to the study of human movement. Along with classroom studies, involvement in original laboratory research and practicum experiences constitute a major means by which students gain a broad understanding of their specialty area. At the completion of the Master's degree students should be able to: (1) provide strategies for solving both practical problems and research questions within the disciplines; and (2) integrate movement-based principles into a variety of activities taking place in laboratory, educational, clinical, and athletic settings.

Prerequisites include a Bachelor of Science or Bachelor of Arts degree with a 24-hour concentration in Kinesiology or its equivalent from an accredited college or university. All applicants are required to take the Graduate Record Examination.

Academic areas of emphasis are: Adapted Physical Activity, Exercise Physiology, Motor Control, and Sport Psychology. Course requirements for the Master of Science degree in Kinesiology with the thesis or non-thesis program of studies are as follows:

#### Thesis Option

*Professional Development* (6 semester hours)

KINE 60103 Research Methods in Kinesiology

PSYC 50423 Graduate Statistics

*Academic Core* (9 semester hours)

KINE 60213 Advanced Biomechanics

KINE 60423 Advanced Motor Behavior

KINE 60613 Physiology of Exercise

*Academic Specialization* (9-12 semester hours)

Academic courses that emphasize specific concentrations such as adapted physical activity, exercise physiology, motor control, or sport psychology.

*Resource Area* (3-6 semester hours)

Courses in related areas determined after a review of student preparation and goals. Must have approval of advisor.

*Thesis* (6 semester hours)

#### Treatise Option

*Professional Development* (3 semester hours)

KINE 60103 Research Methods in

Kinesiology

*Academic Core* (9 semester hours)

KINE 60213 Advanced Biomechanics

KINE 60423 Advanced Motor Behavior

KINE 60613 Physiology of Exercise

*Academic Specialization* (9-12 semester hours)

Academic courses that emphasize specific concentrations such as adapted physical activity, exercise physiology, motor control, or sport psychology.

*Resource Area* (9-12 semester hours)

Courses in related areas determined after a review of student preparation and goals. Must have approval of advisor.

*Treatise* (3 semester hours)

#### Courses of Instruction

**KINE 50970 Special Topics in Kinesiology.** Prerequisite: Approval of adviser and course instructor.

**KINE 60103 Research Methods in Kinesiology.** Emphasis is on the design and analysis of research projects and the writing of research papers.

**KINE 60203 Advanced Motor Development.** Prerequisite: KINE 30423 or consent of the department. Study of how and why the fundamental motor skills progress from inefficient to efficient patterns of movement. Emphasis on the interacting influence of mechanics, control and coordination on naturally developing systems.

**KINE 60213 Advanced Biomechanics.** Investigation of mechanical principles primary to understanding human movement performance. Special emphasis on application of mechanics to the analysis of human performance.

**KINE 60423 Advanced Motor Behavior.** Prerequisite: KINE 20503 or consent of the department. An in-depth study of the mechanisms and processes involved in the control of human motor activity. Focus on contemporary issues of motor control.

**KINE 60433 Curriculum Development in Physical Education.** Prerequisite: KINE 20403 or KINE 40513 or consent of the department. Theories and trends of curriculum construction in physical education. Emphasis on innovative programming in K-12 setting.

**KINE 60443 Behavior analysis in Sport and Physical Education.** The application of behavioral principles and systematic observation procedures and research to teaching physical education and coaching athletes.

**KINE 60503 Physical Activity for Individuals with Disabilities.** In-depth examination of the conceptual framework of adapting for individual differences in activity settings. The impact of inclusion, the Americans with Disabilities Act, and sport classification in fitness, recreation, and school physical activity settings will be discussed. Emphasis on practical application of knowledge.

**KINE 60513 Practicum in Adapted Physical Activity.** Hands-on practical experiences in a physical education/community based sports setting with a variety of individuals with disabilities. Activities will include assisting, teaching and supervising physical education and exercise classes, assessing present needs, developing and implementing an individualized program, teaching individuals as well as small and medium-sized groups, videotaping and observing teaching behaviors, learning to utilize volunteers and aides.

**KINE 60523 Assessment and Programming in Adapted Physical Activity.** Diagnostic-prescriptive process in adapted physical activity; identifying underlying components of various psychomotor assessment instruments; administering and interpreting assessments; developing appropriate programming strategies based on assessment results; and service delivery options for carrying out programming plans.

**KINE 60613 Physiology of Exercise.** Study of physiological responses and adaptations in physical activity germane to selected areas of physical education that are beyond the introductory level.

**KINE 60623 Cardiopulmonary Physiology.** Examination of the responses of the cardiovascular system to acute and chronic exercise. Emphasis on the effects of exercise on cardiac metabolism, hemodynamics, electrophysiology, pulmonary responses, gas exchange, gas transport, and renal function.

**KINE 60633 Laboratory Techniques in Exercise Physiology.** Prerequisite: KINE 60613 or consent of the department. Practical and theoretical knowledge of evaluation of physical performance. Emphasis on acquisition and analysis of data for research in exercise physiology.

**KINE 60643 Clinical Exercise Testing.** Practical and theoretical knowledge of clinical exercise testing. Emphasis on electrocardiography, health appraisal and risk assessment, guidelines and procedures, and pharmacology of cardiac medications.

**KINE 60653 Exercise Metabolism and Endocrinology.** Emphasis on metabolic and neuroendocrine control of bioenergetic pathways during acute and chronic exercise. Presentation of these areas will serve as the foundation for independent library and laboratory research.

**KINE 60663 Practicum in Cardiac Rehabilitation.** Practical experience in exercise testing and prescription in individuals with cardiopulmonary disease. Activities will include assisting in clinical exercise tests, conducting health risk appraisals, and developing, implementing, and supervising an individualized exercise program. All of these activities will be performed at a local hospital-based cardiac rehabilitation center.

**KINE 60713 Psychosocial Aspects of Sport.** Current topics in the psychological aspects of sport are examined in three social contexts: competitive sport, physical education, and exercise settings. Contemporary topics, evaluated in light of selected theoretical positions, include personality, motivation, adherence, communication, expectations, and leadership.

**KINE 60723 Psychology of Youth Sport.** Prerequisite: KINE 60723 or consent of the department. The focus of this course is on theoretical and practical knowledge of contemporary issues in youth sport settings. Topics include socialization, motivation, the role of competition, coaching strategies, moral development, and problematic dimensions of youth sport participation. Students will be required to pursue a practical youth sport experience in conjunction with class projects.

**KINE 60733 Applied Sport Psychology.** Theoretical and practical knowledge of contemporary issues in applied sport psychology. Topics include confidence, arousal, stress, and anxiety, mental imagery, attentional control, goal setting, psychological rehabilitation, and career termination. Laboratory experiences will accompany each topical area.

**KINE 60743 Practicum in Sport Psychology.** Prerequisite: KINE 60733 or consent of the department. The course consists of practical experience in sport psychology interventions and consulting. Activities will include assisting in the administration of psychological assessment, creating and administering team discussions, performance enhancement interventions, and evaluation of program effectiveness. All of these activities will be performed in an athletic environment with a high school, college, or private team or individual sport setting.

**KINE 60970 Workshop in Health and Physical Education.** Prerequisite: Approval of advisor and course instructor.

**KINE 70903 Treatise.** Independent examination of an issues relative to Kinesiology. Students complete a paper under the advisement of a faculty member in the department.

**KINE 70970 Special Problems in Kinesiology.** Prerequisite: Approval of adviser and course instructor.

**KINE 70980 Thesis.** Prerequisite: Admission to candidacy.

**KINE 70990 Thesis.** Thesis



## AddRan College of Humanities and Social Sciences

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### Overview

In 1873, Addison and Randolph Clark established AddRan Male and Female College in Thorp Spring, Texas. That institution later moved to Fort Worth and became Texas Christian University. Though the University has grown and expanded into areas that the Clark brothers could not have conceived, the AddRan College of Humanities and Social Sciences perpetuates their vision of education and the centrality of the liberal arts that lay at its core.

Today, AddRan offers the M.A. degree in the disciplines of Economics, English, and History; the Ph.D. is available in English and History. Three departments (Philosophy, Religion, and Sociology and Criminal Justice) offer a limited number of courses at the graduate level in which graduate students from across the University can enroll. Additionally, faculty in various other AddRan departments also hold appointments to the Graduate Faculty, allowing them to work with graduate students in various capacities including serving on thesis or dissertation committees.



# Economics

[Three/Two Program](#)  
[Master of Arts](#)  
[Courses of Instruction](#)

## Overview

Program under review at time of printing.

Available on the Master of Arts degree.

## Three/Two Program

A combined bachelor's and master's degree program in Economics is available allowing the student to obtain both degrees in five years. See the Department of Economics for details.

## Master of Arts

**Prerequisites:** Equivalent of 15 semester hours in undergraduate economics courses (including three hours in intermediate microeconomic theory and three hours in intermediate macroeconomic theory), plus three semester hours each of statistics and the equivalent of MATH 10524. Applicants not meeting these requirements may be accepted with the condition that they remove the deficiencies by enrolling in the appropriate undergraduate courses.

**Program:** The requirements for graduation with a Master of Arts degree in Economics may be satisfied in either of two ways:

**Thesis track:** By completing 30 semester hours of graduate level credit including ECON 60213, Microeconomic Theory; ECON 60223, Macroeconomic Theory; ECON 60313, Research Proposal Seminar; ECON 50343, Econometrics; and six semester hours of Thesis. Students must also pass a comprehensive theory examination.

**Non-thesis track:** By completing 33 semester hours of graduate level credit including ECON 60213, Microeconomic Theory; ECON 60223, Macroeconomic Theory; ECON 60313, Research Proposal Seminar; ECON 50343, Econometrics; and ECON 6433, Master's Research. Students must also pass a comprehensive theory examination.

A maximum of six semester hours credit may be taken outside the Department.  
Candidates for the M.A. degree are required to perform satisfactorily in a final oral examination.

The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.

## Courses of Instruction

**ECON 50113 Industrial Organization.** Prerequisites: ECON 30223 or graduate standing in economics or business. Theoretical and empirical examination of the interrelationships between market structure, conduct and performance in the industrial sector of the economy.

**ECON 50123 International Trade and Payments.** Prerequisites: ECON 10223 and 10233 or graduate standing in business. Surveys of international trade relationships, balance of payments accounting, theories explaining the pattern of trade and its relationship to economic welfare, policies affecting the pattern of a country's trade with the rest of the world.

**ECON 50133 International Monetary Economics.** Prerequisites: ECON 10223 and 10233 or graduate standing in business. Surveys of various theories of exchange rate determination, along with evaluation of fixed, flexible and mixed exchange rate regimes. In addition, long-term and short-term capital flows are described and explained.

**ECON 50343 Econometrics.** Prerequisites: ECON 10223 and 10233 and either MATH 10043 or DESC 20153, or graduate standing in business. Techniques of simple and multiple regression. Methods for correcting problems of autocorrelation, heteroscedasticity, and multicollinearity.

**ECON 50353 Modeling and Simulation.** Prerequisites: DESC 20153 or Econometrics, computer experience or permission of instructor: An analysis of systems and modeling techniques. The application of such techniques to economic systems. The study of regional economic models and their use of public policy design.

**ECON 50413 Industry Studies.** Prerequisites: ECON 30223 or graduate standing in economics or business. Study of the market structure, conduct and performance of American industries using a case study approach.

**ECON 50423 Regulation of Economic Activity.** Prerequisite: ECON 30223 or graduate standing in business. Public policy relative to commercial and industrial enterprise. Federal agency regulation. Emphasis on industrial and market concentration, competition and monopoly, public utilities, consumer protection and environmental pollution and control policies.

**ECON 50443 International Economic Studies.** Prerequisites: At least nine 9 semester hours credit in economics or graduate standing in business. Detailed analysis of current problems in international economic relationships. The list of topics selected on the basis of their significance in policy design, policy analysis, or contemporary economic well-being.

**ECON 50453 Macroeconomic Studies.** Prerequisites: ECON 30233 or graduate standing in business. Analysis of current macroeconomic issues in theory and policy. Topics may include economic growth, fluctuations in business



activity, investment behavior, consumption functions, macroeconomic planning, and the policy formulation process.

**ECON 50463 Regional Economic Development.** Prerequisites: ECON 30223 or graduate standing in business. Theoretical and empirical examination of regional economic development. Topics may include regional economic resources, development potential, factors affecting industrial location, planning and organization of industrial development, spatial aspects of poverty and urban problems, and methods of regional analysis.

**ECON 50473 Seminar in Financial Economics.** Prerequisites: ECON 30423 or graduate standing in economics or business. Analysis of significant contributions to the literature on investment. Portfolio selection and management giving attention to fundamentalist technical and cyclical approaches.

**ECON 50483 Financial History.** Prerequisites: ECON 10223 and ECON 10233 or graduate standing in Economics or Business. Examines important topics in the development of American and Western European monetary and financial systems. Historical perspectives on innovation, stabilization, and regulation within the major themes of monetary regimes, banking systems, and capital markets.

**ECON 50970 Directed Studies in Economics.** Prerequisites: 12 hours in economics and senior or graduate standing. Supervised reading, research, and preparation of a substantial paper.

**ECON 60213 Microeconomic Theory.** Prerequisites: Graduate standing in economics or business. Study of the economic system from a microeconomic perspective with the help of mathematical models. Topics include the theory of utility and demand, the theory of the firm and market structures and the theory of welfare economics.

**ECON 60223 Macroeconomic Theory.** Prerequisites: ECON 60213. Study of the economic system from a macroeconomic perspective. Examination of the determinants of national income, employment, wage level, and price levels. Use of several alternative analytical frameworks including Keynesian and Classical equilibrium models.

**ECON 60313 Research Proposal Seminar.** Prerequisites: ECON 60213 and 60223. Course designed to introduce the graduate student to conducting independent research. Topics include literature searches, proposal writing, data sources, publishing, and writing methods and practices.

**ECON 60323 Topics in Applied Econometrics.** Prerequisites: ECON 50343 and 60213. Methods used by economists to solve problems that are found in certain data sets and that invalidate the results of classical regression models. Possible topics include two- and three- stage least squares, maximum likelihood, probit analysis and ridge regression, among others.

**ECON 60413 Seminar in Applied Microeconomics.** Prerequisites: ECON 60213, additional prerequisites as required for particular topics. Experience in investigating and analyzing specific microeconomic conditions or policies. The focus for each seminar will be selected from a list of current concerns for which adequate literature is available. Topics might include health care, deregulation, market concentration, tax policy, public utilities, environmental protection or any topic relating to allocation or distribution issues. (May be repeated one time for credit.)

**ECON 60423 Seminar in Applied Macroeconomics.** Prerequisites: ECON 20663, additional prerequisites as required for particular topics. Experience in investigating and analyzing specific macroeconomic conditions or policies. The focus for each seminar will be selected from a list of current concerns for which adequate literature is available. Topics might include counter-inflation policies, unemployment policies, growth policies, monetary policy, fiscal policy, or any topic relating to inflation, unemployment or economic growth. (May be repeated one time for credit.)

**ECON 60433 Master's Research.** Prerequisites: Graduate standing in economics and satisfactory arrangements with a faculty supervisor. An assigned project of a type that is likely to be encountered in a typical work experience to be completed in one semester or two summer sessions. Project will involve data collection, data processing and analysis and the preparation of a formal report to the supervising faculty member.

**ECON 60970 Topics in Economic Analysis.** Prerequisites: Graduate standing; others vary with the topic of the course. May be used as a tutorial or as a scheduled course when topic is not appropriate to an existing course.

**ECON 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**ECON 70980 Thesis.** Thesis

**ECON 70990 Thesis.** Prerequisite: Admission to candidacy. Continuation of 70980.

# English

[Program for the M. A. Degree](#)  
[Admission Requirements](#)  
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[Courses of Instruction](#)

## Program for the M. A. Degree

At least 30 semester hours of credit approved by the Director of Graduate Studies in addition to any course work required because of inadequate prerequisites. The 30 hours will include 6 hours for a thesis and may include up to 9 hours for an approved minor or approved courses in a related field or fields.

### Overview

Available on the Master of Arts and the Doctor of Philosophy degrees.

For admission and general requirements, see the front of this Bulletin. Specific departmental requirements and supplementary information are given here. For details about the program, see our website ([www.eng.tcu.edu](http://www.eng.tcu.edu)).

### Admission Requirements

B.A. degree or equivalent, with credit in English equivalent to the TCU 30-semester-hour major and with sophomore-level credit in a foreign language. Applicants with less preparation may be admitted conditionally, but must take such additional courses as are prescribed by Addran College and the Departmental Director of Graduate Studies. Applicants must present recent Graduate Record Examination scores with the application for admission. Applicants must also submit a writing sample (10-20 pages, exclusive of notes and works cited) that demonstrates appropriate academic and writing skills needed for success in a graduate program in English. Applicants should include with their materials a personal statement outlining career goals, explaining how they match the Program in English at TCU, and three to five references directly relevant to postgraduate work in English studies.

### Program for the Ph.D. Degree

#### 1. The Course Requirements

Completion for credit of a minimum of 54 semester hours of graduate courses, exclusive of credit hours for the dissertation. Postgraduate hours completed more than seven years prior to a student's admission into TCU's English graduate program may not count toward requirements; the graduate advisor will determine applicable credit on a case by case basis. Of the 54 hours, at least 30 must be taken at TCU, and 27 must be in courses that satisfy the graduate core, which is described in subdivisions A, B, and C below:

- A. Resources for English Studies (6 sem. hrs.)
  - 3 sem. hrs. - The Profession of English
  - 3 sem. hrs. - Introduction to Modern Critical Theory
- B. Rhetoric and Composition (6 sem. hrs.)
  - 3 sem. hrs. - Theories of Composition
  - 3 sem. hrs. - History of Rhetoric or Modern Rhetoric
- C. Literature (15 sem. hrs.)
  - 6 or 9 sem. hrs. in literature before 1800
  - 6 or 9 sem. hrs. in literature after 1800
- D. Focus (9 sem. hrs.)

A minimum of 9 semester hours is required in the student's area of concentration, which is to be chosen from the following:

- 1. British Literature
- 2. American Literature
- 3. Rhetoric and Composition

#### 2. The Language Requirement

Reading knowledge of one approved foreign language, typically selected from French, German, Spanish or Latin, is required. Other languages may be offered on approval of the Departmental Graduate Committee, but the language should be the one most appropriate to the student's research, field of concentration or professional development. This requirement may be met by satisfying the general University statement under "Ph.D. Degree Requirements" or by any other means approved by the Departmental Graduate Committee. The language requirement must be satisfied before the student can be admitted to candidacy for the Ph.D. degree.

#### 3. Examinations

A qualifying examination, consisting of three essays written over a period of five days and a two-hour oral examination, is offered when a student has completed for credit 48-54 hours of graduate courses, of which 24-30 hours must be from TCU; has completed the graduate core; and has met the language and residency requirements. These examinations are based upon the student's areas of concentration. Two examinations must fall within the concentration area; the third may fall within a related or directly complementary field. The student and his or her advisory committee will determine the areas to be covered by these specialty examinations. A student who fails one or more parts of the examinations may take them again, but a second failure on one examination bars the student from candidacy.

#### 4. The Dissertation

Doctoral students must complete a dissertation that demonstrates their ability to do independent and original research and to synthesize their findings and existing knowledge into a unified document. A candidate must present a dissertation prospectus to his or her advisory committee for discussion, suggestions and approval before proceeding with the project. The candidate's oral defense of the dissertation is a public lecture based upon his or her findings, presented to the English Department Graduate Faculty, Graduate Students, and other interested persons within the academic community.

**Advisory Committee:** Before taking qualifying examinations, a student requests through the Director of Graduate Studies that the Associate Dean of AddRan College of Arts and Sciences appoint an advisory committee of at least four members. The dissertation director normally serves as chair of the student's advisory committee. One member of the committee may come from outside the English Department if the candidate's dissertation project requires such additional expertise. The advisory committee suggests concentration courses, prepares the qualifying examinations, approves the student for candidacy and directs the dissertation.

**Academic Advising:** Students will be advised by the Departmental Director of Graduate Studies throughout their doctoral programs. The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.

### Courses of Instruction

The content of graduate courses varies from semester to semester. For detailed course descriptions specifying topics, figures, and areas of coverage included in recent offerings, visit the Department's website, where detailed course descriptions, listing both readings and requirements, are posted each term.

### Resources for Literary Study

**ENGL 60103 Bibliography and Methods of Research.** History, materials and techniques of manuscript and book production; bibliographical description; use of libraries and bibliographical tools, introduction to textual analysis; thesis and dissertation problems and procedures.

**ENGL 60113 The Profession of English.** An introduction to the practical and theoretical issues of the profession for all first semester graduate students. Topics included concern the history of the university and departments of English, pedagogical ethics, the necessity and methods of research, and the mechanics of scholarly publication in the humanities.

**ENGL 60123 Introduction to Modern Critical Theory.** A seminar on major authors and issues in contemporary critical theory.

**ENGL 80123 Seminar in Literary Theory.** A seminar in the theoretical problematics of literary language and in current trends within critical theory. Topics change each term; may be repeated for credit.

### Writing Workshops

**ENGL 50243 Teaching Writing.** Prerequisites: ENGL 10803 or 10833, and one 20000-level ENGL course. A course for teachers of English combining theories of composition with practical pedagogy and classroom strategies for the teaching of writing. Not applicable toward degree requirements for the Ph.D. in English.

**ENGL 60203 Writing for the Professions.** A workshop for the student who wishes to learn how to write in a specific academic discipline or in a profession.

### Studies in Language

**ENGL 60303 History of the English Language.** A study beginning with a reading knowledge of Old English and following the development of the language through Early Modern English.

**ENGL 60313 Introduction to English Linguistics.** An introduction to the phonology, morphology and syntax of Modern English. Some attention to language acquisition, dialects and language change. Prerequisite: ENGL 60303 or permission of instructor.

### Studies in British Literature

**ENGL 60403 Beowulf.** A close reading of the epic in Old English with some attention to modern criticism of the poem. Prerequisite: ENGL 60303 or a course in Old English.

**ENGL 60413 Chaucer.** Chaucer's language and poems with emphasis on *The Canterbury Tales* as a work of art and as a reflection of the age.

**ENGL 60423 Prose and Poetry of the English Renaissance.** The prose writers and poets of 16th and 17th century England in relation to the cultural circumstances influencing and being influenced by their works. Topics may include the prospect and enactment of censorship; the centrality of the patronage system; courts and courtiers; changing views of monarchy and obedience; religious controversy; issues of gender, ethnicity and class; literature and science; pseudo-nonfictional strategies; adaptations of the bible, history, and mythology; and early book production and circulation.

**ENGL 60433 Renaissance Drama Exclusive of Shakespeare.** The study of the works of major Elizabethan and Jacobean playwrights.

**ENGL 60443 Seventeenth Century Poetry.** Study of the works of major seventeenth century poets including Donne and Marvell.

**ENGL 60453 The Age of Dryden and Pope.** English literature from 1688 to 1745 with emphasis on Dryden,

Swift and Pope, exclusive of the drama.

**ENGL 60463 The Age of Johnson.** English literature from 1745-1800, with emphasis on Johnson, Boswell, Burns and other major writers exclusive of the drama.

**ENGL 60473 British Novel I.** Major fiction to the early nineteenth (1832) century.

**ENGL 70403 British Novel II.** Major fiction from the early nineteenth to the early twentieth century.

**ENGL 70413 Romantic Poetry and Prose.** The study of works by Wordsworth, Coleridge, Byron, Shelley, Keats and others.

**ENGL 70423 Victorian Poetry and Prose.** The study of major works and authors, including Arnold, Browning and Tennyson.

**ENGL 70433 Modern British Novel.** The study of major fiction of the twentieth century.

**ENGL 70443 Modern British Poetry.** Study of twentieth century British poets.

**ENGL 70453 Modern British Drama.** The study of important plays and playwrights of the twentieth century.

**ENGL 70463 Modern British Literature.** Survey of major trends and writers in British literature since 1900.

**ENGL 70473 Twentieth Century Irish Writers.** Study of important Irish works, with emphasis on Yeats, Joyce and Synge.

**ENGL 70483 Victorian Women Writers.** An intensive examination of Victorian women poets, novelists, and prose writers in the context of historical conditions and feminist theory.

**ENGL 70493 Nineteenth Century Studies in British Literature.** Selected topics in nineteenth-century British literature (variable emphasis each semester). Past offerings have included the Medieval Revival and Nineteenth-Century Literature and Rhetoric.

**ENGL 80403 Seminar in Spenser.** Seminar in Spenser.

**ENGL 80413 Seminar in Shakespeare.** Seminar in Shakespeare

**ENGL 80423 Seminar in Milton.** Seminar in Milton.

**ENGL 80433 Seminar in British Literature of the Eighteenth Century.** Seminar in British literature of the eighteenth century.

**ENGL 80443 Seminar in British Literature of the Romantic Period.** Seminar in British literature of the romantic period. Variable emphasis each semester.

**ENGL 80453 Seminar in British Literature of the Victorian Period.** Variable emphasis each semester. (Past offerings have included The Brownings' Circle.)

**ENGL 80463 Seminar in Modern British Literature.** Seminar in modern British literature.

**ENGL 80473 Seminar in Renaissance Literature and the "New" Science.** This course examines how and why artists and scientists in the century c. 1550-1650 interacted intellectually as they did. Topics include influences of scientific developments and discoveries upon European (chiefly British) letters; strategies used by writers to appropriate, revise, or contest scientific development in astronomy, medicine, philosophy and other disciplines; and relationships between scientific and literary discourses of change.

### Studies in American Literature

**ENGL 60503 Early American Literature.** American literature from first settlement through 1800, including the Puritan writers (Winthrop, Mather, etc.), the shapers of the American Republic (Paine, Jefferson, Franklin, the Federalist writers, etc.), and early writers of the New Nation (Brown, Dwight, Freneau, Rowson, etc.).

**ENGL 70503 American Novel I.** The American novel from its beginnings to 1890. Topics examined include the Gothic and sentimental novelists (Brown, Rowson), the early national novel (Cooper), the Romantics (Hawthorne, Melville), Realism and the Realists (Twain, James, Howells), and the early Naturalists (Norris).

**ENGL 70513 American Novel II.** The development of the American novel from 1890 to the start of World War II.

**ENGL 70523 American Novel III.** The development of the American novel from 1940 to the present.

**ENGL 70533 The American Short Story.** A study of short fiction in American literature.

**ENGL 70543 American Poetry I.** The development of American poetry from the beginnings to 1900.

**ENGL 70553 American Poetry II.** Major poets and works of the twentieth century.

**ENGL 70563 American Drama.** Major playwrights and plays in American literature.

**ENGL 70573 American Non-Fiction Prose.** Major documents of non-fiction prose in American literature.

**ENGL 80503 Seminar in American Literature before 1900.** Topics vary; recent offerings have included "Emerson and His Circle" and "The American Renaissance."

**ENGL 80513 Seminar in American Literature since 1900.** Seminar in American literature since 1900.

**ENGL 80583 Seminar in Contemporary African-American Literature.** This seminar provides graduate students with the opportunity to research and present theoretical approaches to representative contemporary fiction by African-Americans. Continuities will be established between theories shaped by the Black Arts Movement of the sixties and those shaped by post-modernist thinking. Representative writers may include Alice Walker, Toni Cade Bambara, Charles Johnson, Toni Morrison and Ernest Gaines.

#### **Studies in Comparative Literature**

**ENGL 50603 Classical Drama.** Prerequisites: ENGL 10803 or 10833, and one 20000-level ENGL course. The study of plays surviving from ancient Greece and Rome.

#### **Studies in Rhetoric and Composition**

**ENGL 60703 Introduction to Composition Studies.** A survey of the major contemporary theoretical statements about composing and the teaching of composition.

**ENGL 60713 Modern Rhetoric.** Major theories of rhetoric and important rhetoricians of the twentieth century.

**ENGL 70703 History of Rhetoric.** A study of the major authors and issues in the history of rhetoric from antiquity to the present day.

**ENGL 70713 Rhetoric and Literature.** The applications and implications of rhetorical criticism for the study of literature.

**ENGL 70723 Rhetoric and Criticism.** A study of classical and modern rhetorical theory, with emphasis on the uses of rhetoric in the study of modern communication.

**ENGL 80703 Seminar in Rhetoric.** A study of selected major figures and issues in the history of rhetoric.

#### **Directed Studies**

**ENGL 50970 Directed Study in English.** Prerequisites: ENGL 10803 or 10833, and one 20000-level ENGL course. Directed Study in English.

**ENGL 70970 Directed Studies.** Directed Studies in English.

**ENGL 70980 Thesis.** Thesis

**ENGL 70990 Thesis.** Thesis

**ENGL 90980 Dissertation.** Dissertation.

**ENGL 90990 Dissertation.** Dissertation.

#### **Other Courses**

**ENGL 60710 Teaching Practicum.** Designed to support graduate instructors' teaching of English. Students in the course will explore methods of syllabus construction, teaching, assigning, and grading student writing.

**ENGL 70000 English Library Access.** Library Access for English graduate students.

**ENGL 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

# History

[Program for the M.A. Degree](#)  
[Program for the Ph.D. Degree](#)  
[Courses of Instruction](#)

## Overview

Available on the Master of Arts and Doctor of Philosophy degrees.

**Prerequisites:** The B.A. degree or its equivalent with a 24-semester-hour major in history, and sophomore-level credit in a foreign language. Applicants lacking these qualifications may be admitted conditionally, but must take such preparatory work as may be prescribed by the Chair of the Department of History. Applicants should take the Graduate Record Examinations and submit these scores with their admission materials. (The History Department Graduate Committee considers applications during the fall and spring semesters. Yet for maximum consideration applicants should submit their materials before February 1. Late applications will be accepted but will not have priority of consideration.)

## Program for the M.A. Degree

A minimum of 30 approved semester hours, including at least 15 in history courses and 6 in thesis. A maximum of 9 hours of supporting work in related disciplines is optional. History 50063 (Bibliography and Historical Methods) is required of all graduate students. For specific requirements, consult the History Department Guide to Graduate Study.

## Program for the Ph.D. Degree

For admission to the doctoral program, the student must present a strong academic record and provide evidence of an ability to do scholarly research and writing. Even though he or she may have earned an M.A. degree at TCU, the student must reapply to AddRan College before being admitted to work toward the Ph.D. degree. Letters of recommendation, Graduate Record Examinations scores, a statement of purpose and writing sample, and three letters of recommendation are required.

The doctorate is offered in the areas of the United States and Latin America history. Students will normally be expected to earn the M.A. degree before continuing toward the Ph.D. Degree requirements are:

1. A suitable number and variety of graduate courses to prepare the student for the qualifying examination and for the writing of the dissertation. In addition to the major area of specialization, the student also will complete course work in two minor areas, usually 9 hours in each. With the approval of the student's graduate committee, as many as 12 hours may be taken outside the department. The doctoral program will comprise no fewer than 54 hours of graduate courses for credit exclusive of credit-hours for the dissertation.
2. Reading knowledge of one approved foreign language, usually selected from French, German, or Spanish. The language should be the one most appropriate to the student's research and fields of concentration. Reading knowledge can be demonstrated either by superior performance on the ETS examination, by satisfactory completion of a special course offered by the Modern Languages Department, by independent study and successful examination by a member of the department fluent in the language, or by achieving at least a grade of "B" in six hours of sophomore level college language courses. The language requirements must be met no later than the end of the first semester of the second year.
3. A comprehensive qualifying examination consisting of: a written exam covering one of the two minor areas, a written and oral exam covering the major area of specialization. The student must pass the written minor field and major field exams before taking the oral exam. On both the written and the oral he or she will be allowed only two opportunities. Upon the completion of the comprehensive qualifying examination, the student is admitted to candidacy. For specifics regarding this examination, see the *History Department Guide to Graduate Study*.
4. A doctoral dissertation constituting an original contribution to scholarship or a new synthesis of existing knowledge. The candidate will defend the dissertation in a final oral examination. The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.

## Courses of Instruction

**HIST 50063 Historical Methods.** Techniques of historical research and documentation. Evaluation of documents, applying internal and external criticism to determine validity of use. Oral history research evaluation and interviewing techniques.

**HIST 50070 History, Administration, and Management of Archives, I and II.** The historical development of archival institutions, procedures and techniques with special emphasis on American federal, state and local records, both public and private. Students will be introduced to professional field work in the archives of the participating institutions.

**HIST 50080 Archival Internship.** Supervised professional training at the Federal Archives and Records Center of Fort Worth, the Regional State Archives of Texas, the Amon Carter Library and the Manuscript Collection of Texas Christian University. Open only to students who are taking or have completed HIST 50070. Required of all students who select the Archives Studies option.

**HIST 50933 Philosophy of History.** Prerequisites: six hours of history, three hours of philosophy. A philosophical analysis of historiography: the logical, conceptual and epistemological characterization of what historians do; also includes a study of traditional attempts to discover some meaning which transcends the intelligibility sought and achieved by ordinary historical work.

**HIST 50943 Studies in Ethno-History.** The use of ethnological data and historical documents for the cultural history of literate and non-literate peoples.

**HIST 50960 Historiography and Bibliography.** The major historians of the past, changes in the interpretation and philosophies of history and the major bibliographic sources utilized in the writing of history.

**HIST 50970 Special Studies in History.** Special Studies in History. (NWH or WH)

**HIST 50980 Historical Writing and Editing.** The methods and problems of research and historical writing. Also covers the principles and methods of editing historical journals and documents including archival manuscripts. 3 hours NWH or WH.

**HIST 60003 Graduate Readings in the History of War.** Traces the causes, course, and effects of wars in the Western world from ancient times to the present. Emphasis is placed on the principal wars, key battles, and technological innovations. Topics may vary to concentrate on one period.

**HIST 60013 Graduate Readings in Women in the Western World since 1500.** Readings in women's experiences in the West since 1500. Topics will cover issues such as changes involving gender and family, work, sexuality, and politics.

**HIST 60023 Graduate Readings in the Women's Movement in England and America, 1792-1972.** Beginning with Mary Wollstonecraft's writings and progressing to the "new feminism" of the 1960s, this course looks at the political ideas of the women's suffrage movement on both sides of the Atlantic and notes the similarities and differences. The readings examine the earliest forms of political agitation by women, militancy, the alliance with the left, and pragmatic feminism emerging in the 1970s.

**HIST 60103 Graduate Readings in Ancient Greece.** Study of ancient Greece, including the Bronze Age, Classical, and Hellenistic periods, with emphasis on ancient sources and modern historiographical issues.

**HIST 60113 Graduate Readings in the Roman Republic and Empire.** Study in ancient Rome, including the Etruscan period, the Republic, and the Empire through the fifth century, with emphasis on the ancient sources and modern historiography issues.

**HIST 60203 Graduate Readings in the Renaissance.** The political, social, economic and cultural development of Europe, concentrating on the fourteenth and fifteenth centuries. Topics include the Black Death; the crises of the fourteenth century; Renaissance Florence and Venice; the Renaissance in northern Europe.

**HIST 60213 Graduate Readings in the Reformation.** Focuses on Europe in the sixteenth century. Topics will include the Protestant and Catholic reformations as theological, social, economic and political events; popular culture; witchcraft; the impact of overseas expansion.

**HIST 60223 Graduate Readings in Seventeenth-Century Europe.** The crisis of the seventeenth century-fiction or reality? Course focuses on issues raised by the great historiographical debate about the existence, nature and extent of crisis in the seventeenth century.

**HIST 60233 Graduate Readings in Enlightenment Europe.** European thought and society in pre-revolutionary Europe. Topics will include the demographic revolution, industrialization, empire and its impact, the writing and reception of Enlightenment ideas at all levels.

**HIST 60243 Graduate Readings in Spain and Portugal.** Use of primary and secondary sources to examine the cultural, political, religious, and diplomatic evolution of Iberian institutions.

**HIST 60303 Graduate Readings in Europe, 1815-1870.** Traces the major political diplomatic, military, and social developments of the period. Principal topics include the impact of the French Revolution and Napoleon, the rise of nationalism and romanticism, the revolutions of 1830 and 1848; the Second Empire of France, and the unification of Italy and Germany.

**HIST 60313 Graduate Readings in Europe, 1870-1918.** Traces the major political, diplomatic, military, and social developments of the period. Principal topics include developments within the major European states, the rise of alliance systems, the arms race, imperialism, immediate causes of the First World War, and the war itself and its impact on Europe and the world.

**HIST 60323 Graduate Readings in Europe, 1918-1945.** Traces the major political, diplomatic, military, and social developments of the period. Principal topics include the impact of the First World War, the peace settlements following the war, the rise of totalitarianism and the failure of European democracy in many states, the drift toward war including the civil war in Spain and invasion of Ethiopia, and the Second World War itself.

**HIST 60333 Graduate Readings in Europe, 1945-1991.** Traces the major political, diplomatic, military, and social developments of the period. Principal topics include the diplomacy of the Second World War, the impact of the war on Europe, the causes of post-war tensions between East and West, the division of Germany, developments within the states of Europe, the end of European colonialism, the Common Market, the course of the Cold War, and European relations with the U.S. and U.S.S.R.

**HIST 60343 Graduate Readings in the French Revolution and Napoleon.** Begins with an overview of French history, then examines the background and causes of the French Revolution: political, intellectual, social, and economic. Traces events leading to the liberal monarchy, its replacement with a radical republic, and the rise to power of Napoleon Bonaparte. Discusses Napoleonic France and Europe and the wars of the French Revolution and

Napoleonic period, ending with the Hundred Days in 1815.

**HIST 60353 Graduate Readings in Modern France, 1815 to the Present.** Traces the domestic history of France in the period, beginning with the impact of the French Revolution and Napoleon. Traces the political, diplomatic, military, and social developments of the period. Also discusses France's role as a colonial power and the impact on France of two world wars as well as the Indo-China and Algerian Wars. Ends with recent developments in the Fifth Republic.

**HIST 60363 Graduate Readings in Modern Germany, 1815 to the Present.** Traces the major political, diplomatic, military, economic, and social events in Germany in the period. Topics include the impact of the French Revolution and Napoleon, the rise of nationalism, the social impact of industrialization, political unification under Bismarck, the two world wars and their effects on Germany, the division of Germany following World War II and its reunification. Includes recent developments in the Federal Republic.

**HIST 60373 Graduate Readings in European Thought and Culture, 1800 to the Present.** Traces European thought and culture in the nineteenth and twentieth centuries. Topics include nationalism, industrialism, romanticism, naturalism, socialism, the search for place, and the rise of fascism. Includes key developments in literature and the arts.

**HIST 60403 Graduate Readings in Central Europe, 1700 to the Present.** Traces events in Central Europe from the general European revolutions of 1848 through the collapse of communism. Includes a discussion of the causes, course, and effects of the two 20th century world wars. Includes an overview of recent developments.

**HIST 60413 Graduate Readings in Russia to 1861.** The evolution of the early Russian state and its development under the grand princes and czars to the emancipation of the serfs and the beginning of the "great reform."

**HIST 60423 Graduate Readings in Russia, 1861 to the Present.** The forces and personalities that molded modern Russia after the emancipation of the serfs, the revolutionary movements and their leaders, and the economic and political factors that brought the downfall of the czarist regime.

**HIST 60433 Graduate Readings in China and Japan to 1800.** The underlying foundations of Chinese and Japanese culture, emphasizing especially the values, religions, and personalities as well as the political, military, and social institutions.

**HIST 60443 Graduate Readings in China and Japan, 1800 to the Present.** The major events and personalities influencing the development of China and Japan and the impact of the West upon the region.

**HIST 60513 Graduate Readings in Tudor-Stuart England, 1485-1714.** This course provides a careful consideration of the nature of "modern" England. The readings will analyze the monarchy and parliament built up by the Tudor Monarchs and the crises of the Stuart period: the Puritan Revolution, Restoration and the Glorious Revolution. There will be special emphasis upon the clash of ideas, religious, social and political.

**HIST 60523 Graduate Readings in England and Great Britain, 1603 to the Present.** Selected readings in such themes in the history of modern Britain as constitutional evolution, technological and economic change, empire and great power status, and the creation of the welfare state.

**HIST 60533 Graduate Readings in the History of Great Britain, 1815-1901.** These readings focus upon the transformation of British society from traditional social classes and means of work through the Industrial Revolution. Political reform pointed the way toward social and economic reform found primarily in the next century. Graduate students will investigate myths of "Victorian" ideals and religious thought and how emerging socialism challenged the cultural norms.

**HIST 60543 Graduate Readings in Twentieth-Century Britain.** This course analyzes the two World Wars and their impact upon British society, the triumph of socialism in the Labour Party and its decline towards the end of the century. Britain's political culture as it changed from a dominant world power to a second rank nation despite its Commonwealth and its membership in the European community are carefully documented.

**HIST 60553 Graduate Readings in the British Empire, 1603-1857.** Selected readings in the establishment and governance of the first British colonial presence in Ireland and North America, the evolution of colonies of settlement and colonies of color, formal and informal connections between the metropole and its colonies.

**HIST 60563 Graduate Readings in the British Empire and Commonwealth, 1857-1975.** Selected readings in the "new imperialism" of the late 19th and early 20th centuries, World War I and the empire, nationalism and the "end of empire" after 1945.

**HIST 60603 Graduate Readings in Colonial America from the Age of European Discovery to 1763.** Readings from the Age of European Discovery of America through the Great War for Empire of 1754-1763. The course will examine political, economic, religious, and social and intellectual changes.

**HIST 60613 Graduate Readings in Revolutionary America, 1763-89.** Readings from the end of the Great War for Empire through the establishment of the United States under the Constitution. The course examines differences between the colonies and Britain, the Revolution, the Confederation period, and the Constitution.

**HIST 60623 Graduate Readings in the Age of Jefferson, 1789-1828.** Readings from the advent of the Washington administration to the election of 1828. The course examines the differences between Federalists and Republicans, the causes of, the course of the War of 1812, and the Era of Good Feelings.

**HIST 60633 Graduate Readings in the Age of Jackson, 1829-1860.** Traces the rise of Jacksonian Democracy, the Jackson presidency and subsequent administrations to 1860, Manifest Destiny and the westward movement, and sectional tensions leading to the Civil War.



**HIST 60643 Graduate Readings in the Civil War and Reconstruction, 1861-1876.** Covers the outbreak of the Civil War, the military campaigns of the war, political, social and economic developments of the period, and the postwar reconstruction of the union.

**HIST 60653 Graduate Readings in the Progressive Period, 1877-1919.** Readings in the rise of big business, the populist movement and progressive reform in the period from the close of Reconstruction through the Wilson administration.

**HIST 60663 Graduate Readings in America Between World Wars, 1919-1941.** An examination of the political, economic, and cultural forces of the 1920s and 1930s. Developments in areas such as technology, migration, business and agriculture are included.

**HIST 60673 Graduate Readings in United States History, 1941-1975.** The emergence of the United States as a world power and its part in the Cold War. The importance of new technologies, migration and economic development. The rising impact of globalization on the United States.

**HIST 60703 Graduate Readings in United States Foreign Relations from Independence to World War I.** Traces the history and historiography of U.S. foreign relations to World War I. Topics include the diplomacy of the American Revolution, the foreign policy of the new republic, the causes and consequences of the War of 1812, national expansion, the era of manifest destiny, Civil War diplomacy, and American imperialism.

**HIST 60713 Graduate Readings in United States Foreign Relations from World War I to the Present.** Traces the history and historiography of U.S. foreign relations from World War I to the present. Topics include the diplomacy of the First World War, the interwar wars, the Second World War, the Cold War, and the post-Cold War era.

**HIST 60723 Graduate Readings in the Constitutional History of the United States.** Examines the constitutional history of the United States and constitutional historiography from the colonial period to the present.

**HIST 60733 Graduate Readings in the American Presidency.** Traces the historical development of the presidency from the Washington administration to the present, with emphasis on selected administrations.

**HIST 60743 Graduate Readings in the American West.** Traces the history of the Trans-Mississippi West from the Spanish conquest to the present.

**HIST 60753 Graduate Readings in the Modern South.** Emphasis on economic development of the South, technology, agriculture, and industry. Examination of political power, the civil rights movement and cultural developments in education, music and literature.

**HIST 60763 Graduate Readings in Native American History.** Surveys the history of Native Americans from their arrival in America to the present day.

**HIST 60773 Graduate Readings in American Ethnic History.** Surveys the history of various ethnic groups in U.S. history with emphasis on the quest for identity, assimilation, and acculturation.

**HIST 60783 Graduate Readings in American Business History.** Use of primary and secondary sources to examine the evolution of business organizations, the impact of technology on business, the interaction between business and society, and business-government relations.

**HIST 60793 Graduate Readings in the History of American Medicine and Public Health.** A social and cultural approach to the place of medicine and public health in American life, from the colonial era to the present. Emphasis on the relationship of medicine and economic development. Relationship of disease and epidemics with economic factors is examined.

**HIST 60803 Graduate Readings in the Vietnam War.** Traces the history of pre-European Vietnam, French conquest, Indo-China War, roots of US involvement, the course of the US war, US domestic developments, and events in post-1975 Socialist Republic of Vietnam.

**HIST 60813 Graduate Readings in US Military History.** Traces the role of the armed forces in American society through a study of the origins and development of military institutions, traditions, and practices. Traces principal wars, including their causes, course, and effects, and treats the effects of leadership and new technologies.

**HIST 60823 Graduate Readings in US Military History.** Traces the role of the armed forces in American society through a study of the origins and development of military institutions, traditions, and practices. Traces principal wars, including their causes, course, and effects, and treats the effects of leadership and new technologies.

**HIST 60903 Graduate Readings in Latin America, the Colonial Period.** Examination of primary and secondary sources relating to the Iberian and native backgrounds, the evolution of colonial institutions, and the independence movements in Latin America.

**HIST 60913 Graduate Readings in Latin America, the National Period.** Examination of primary and secondary sources relating to the colonial inheritances influencing national development, the efforts at modernization in the nineteenth century, the social revolutionary movements of the twentieth century, and United States-Latin American relations.

**HIST 60923 Graduate Readings in United States-Latin American Relations.** Examination of early relations among the independent republics, the impact of the Monroe Doctrine, the Pan American movement, and the rise of and challenge to U.S. hegemony in Latin America using both primary and secondary sources.

**HIST 60933 Graduate Readings in Revolution in Latin America.** Examination of revolutionary theory and revolutions in Latin America using primary and secondary sources.

**HIST 60943 Graduate Readings in the Spanish Borderlands.** Study of the clashing and mingling of cultures in regions formerly held by Spain in the southeastern and southwestern United States based on primary and secondary accounts.

**HIST 60953 Graduate Readings in the History of Argentina and Chile.** Review of primary and secondary sources relating to the development of southern South America from colonial times to the present.

**HIST 60963 Graduate Readings in the History of Brazil.** The growth of Brazil from its colonial origins to its rank as a major nation is traced using primary and secondary accounts.

**HIST 60983 Graduate Readings in the Indians of Middle and South America.** Use of primary and secondary sources to examine the major pre-Columbian civilizations, the impact of the Iberian intrusion, and the role of the indigenous population in modern national life.

**HIST 60993 Graduate Readings in the History of Mexico.** Evolution of Mexico from colonial times to contemporary oil power based on primary and secondary sources.

**HIST 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**HIST 70980 Thesis.** Thesis

**HIST 70990 Thesis.** Thesis

**HIST 80083 History as a Profession: Teaching, Research, and Service.** Covers all aspects of the teaching profession, including selection of readings, designing courses, preparation and delivery of class lectures, leading class discussions, preparing and grading exams, and professional expectations during and after graduate school.

**HIST 80090 Supervised Teaching at the College Level.** All teaching assistants who are assigned to teach undergraduate courses must enroll for this course.

**HIST 80100 Graduate Seminar in Ancient History.** As a seminar, this course emphasizes reading, research, writing, and discussion. An occasional lecture may be scheduled. Topics of study will vary from semester to semester. Prerequisites: admission to the graduate program and permission of the instructor.

**HIST 80200 Graduate Seminar in Women's History.** This seminar will investigate women's experiences in and contributions to the history of the western world, Europe and the United States. Topics may include, but are not limited to: family and reproduction, work, politics, gender issues, slavery, and the frontier.

**HIST 80300 Seminar in Early Modern European History.** Seminar in early modern European history.

**HIST 80303 Seminar in Early Modern European History.** Seminar in early modern European history.

**HIST 80400 Seminar in Modern European History.** Seminar in modern European history.

**HIST 80403 Seminar in Modern European History.** Seminar in modern European history.

**HIST 80440 Seminar in Russian History.** Seminar in Russian history.

**HIST 80500 Seminar in British History.** Seminar in British history.

**HIST 80600 Seminar in United States History.** Seminar in U.S. history.

**HIST 80603 Seminar in U.S. History.** Seminar in U.S. history.

**HIST 80700 Seminar in Military History.** Seminar in military history.

**HIST 80800 Seminar in Hispanic American History.** Seminar in Hispanic American history.

**HIST 80803 Seminar in Vietnam War History.** Traces the history of China's social and military influence on Vietnam, the history of pre-European Vietnam, French conquest, Indo-China War, the roots of U.S. involvement, the course of the U.S. war, U.S. domestic developments and post-1975 Socialist Republic of Vietnam.

**HIST 80900 Seminar in Latin American History.** Seminar in Latin American history.

**HIST 80903 Seminar in Latin American History.** Seminar in Latin American history.

**HIST 90980 Dissertation.** Prerequisite: Written permission of chairman of the department.

**HIST 90990 Dissertation.** Prerequisite: Admission to candidacy. Continuation of 90980. A minimum of 12 hours of dissertation credit is required.

# Philosophy

## [Courses of Instruction](#)

### Courses of Instruction

**PHIL 50933 Philosophy of History.** (HIST 50933) Prerequisites: 6 hours history and 3 hours philosophy. A philosophical analysis of historiography; the logical, conceptual and epistemological characterization of what historians do; also includes a study of traditional attempts to discover some meaning which transcends the intelligibility sought and achieved by ordinary historical work.

**PHIL 50970 Directed Studies in Philosophy.** Prerequisite: Permission of instructor.

# Religion

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## [Courses of Instruction](#)

### Courses of Instruction

**RELI 50130 Seminar in Biblical Studies.** Prerequisite: approval of instructor. A particular topic in Biblical Studies will be selected for detailed study. (3-6 sem. hrs)

**RELI 50970 Directed Study in Religion.** 1 - 6 sem. hrs.

## Sociology

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### Overview

Anthropology

Administered by the Department of Sociology.

**ANTH 60670 Directed Reading Or Research In Anthropology.** Prerequisite: Graduate standing and consent of instructor. Designed for graduate students who undertake minor reading or research projects in anthropology in consultation with the instructor.

Sociology

**SOCI 50610 Directed Study in Sociology.** Prerequisite: permission of instructor, and graduate standing. Supervised reading, research and completion of a substantial paper. May be taken for credit ranging from 1-6 semester hours and may be taken more than once.

## College of Science and Engineering

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### Overview

The College of Science and Engineering offers graduate study for Master's and Doctoral degrees in several areas. Master of Arts degrees are available in Biology, Chemistry, Physics and Astronomy, and Psychology. Master of Science degrees are offered in Biology, Chemistry, Environmental Sciences, Geology, Physics and Astronomy, and Psychology. A Master of Arts in Teaching degree is available in Mathematics. The Ph.D. degree is available in Chemistry, Physics and Astronomy, and Psychology.

Program descriptions and information concerning admission and degree requirements for each program are presented in the departmental listings which follow. Requests for information, application forms, and completed applications for admission to graduate programs of the college may be submitted to:

College of Science and Engineering  
Attention: Graduate Studies  
TCU Box 298960  
Fort Worth, TX 76129  
USA

Administrative offices for the College of Science and Engineering are located on the 5<sup>th</sup> floor of the Sid W. Richardson Building (suite 501). Sid W. Richardson also houses departmental offices of Chemistry, Geology, and Physics and Astronomy. Biology, Mathematics, and Psychology are in Winton-Scott Hall. College administrative offices will relocate to the Tucker Technology Building when that building opens for occupancy in fall 2002.

# Biology

[Master of Science Degree](#)

[Master of Arts Degree](#)

[Courses of Instruction](#)

## Overview

Available on Master of Arts or Master of Science degrees. Students who have majored in other disciplines may be admitted if undergraduate deficiencies can be removed within a reasonable length of time.

**B.S./M.S. Program.** A combined B.S./M.S. program in Biology is available allowing a student the opportunity to obtain both a Bachelor of Science and a Master of Science degree in only five years. See the Undergraduate Studies Bulletin for a description.

## Master of Science Degree

**Prerequisites:** Bachelor's degree in Biology; Chemistry through Organic; General Physics (one year); Math through Calculus.

**Requirements:** Thirty approved graduate hours including: Research in the Biological Sciences (BIOL 60011), Scientific Presentation (BIOL 60001), 1 hour seminar in Biology (BIOL 60910) or Environmental Science, 12 additional hours Biology (minimum), 6 hours thesis, 9 hours of approved electives. Limit of 3 hours of assigned problems unless approved by graduate committee or department chair.

## Master of Arts Degree

**Prerequisites:** Bachelor's degree in Biology or equivalent; Chemistry through Organic; General Physics (one year); Math through Calculus.

**Requirements:** Thirty-six hours of graduate coursework including: Research in the Biological Sciences (BIOL 60011), Scientific Presentation (BIOL 60001), 1 hour seminar in Biology (BIOL 60910) or Environmental Science, 21 additional hours in Biology (minimum); 12 hours approved electives. Limit of 3 hours of assigned problems unless approved by graduate committee or department chairman.

## Courses of Instruction

**BIOL 50103 Terrestrial Ecosystems.** Three hours lecture per week. Prerequisite: BIOL 30403 or permission of instructor. Concepts, principals, and mechanisms of the function of terrestrial ecosystems, including ecophysiology of component species, nutrient cycling, energy flow, ecosystem stability and global ecology.

**BIOL 50133 Biochemistry.** See Biology 50133 Prerequisite: CHEM 30133, 40113 or permission of the instructor. Three lecture hours per week. A general survey of structure and function of biologically important compounds with methods of analysis.

**BIOL 50143 Biochemistry.** See Biology 50143 Prerequisite: CHEM or BIOL 50133. Biosynthesis, replication of DNA, synthesis and processing of RNA and proteins, and special topics e.g. brain and muscle functions, hormones and signal transduction, cancer, development, etc.

**BIOL 50303 Systematics and Evolution.** Three hours lecture per week. Prerequisite: BIOL 30403. Concepts of classical and numerical taxonomy and the principles of phylogeny, organic evolution and speciation.

**BIOL 50313 Biogeography.** Prerequisite: Biology 30403 or permission of instructor. Three hours lecture per week. An ecological approach to the study of the distribution of plant and animal communities.

**BIOL 50324 Techniques in Cell and Molecular Biology.** Three hours of lecture and one 3-hour laboratory per week. Prerequisite: Concurrent enrollment in Biology or Chemistry 50133 or equivalent and permission of instructor. Survey of techniques central to molecular and cellular biology, including centrifugation, chromatography, electrophoresis, spectrophotometry and radioisotopes.

**BIOL 50463 Fundamentals of Neuroscience.** See Psychology 50463 Prerequisite: Graduate or senior standing or approval of the instructor. The fundamentals of functional neuroanatomy and neurophysiology with an emphasis on experimental and theoretical analysis of the basic brain behavior relationships.

**BIOL 50472 Laboratory in Physiological Psychology and Neuroscience.** Prerequisite: PSYC 30463 or its equivalent or PSYC 50653 or its equivalent, or concurrent registration in either PSYC 50436 or PSYC 30463. One lecture and one laboratory per week. Emphasis will be on the laboratory techniques employed in physiological psychology and neuroscience in analyzing the neural and hormonal correlates of behavior (Also offered as PSYC 50472)

**BIOL 50482 Laboratory in Physiological Psychology and Neuroscience.** Prerequisite: PSYC 30463 or its equivalent or PSYC 50653 or its equivalent, or concurrent registration in either PSYC 50436 or PSYC 30463. One lecture and one laboratory per week. Emphasis will be on the laboratory techniques employed in physiological psychology and neuroscience in analyzing the neural and hormonal correlates of behavior (Also offered as PSYC 50482)

**BIOL 50502 Biochemistry Laboratory.** See Biology 50502 Two four-hour laboratory periods per week. Prerequisite: CHEM 50143 or concurrent registration.

**BIOL 50602 Preparation of Environmental Impact Statements.** See Geology 50602 Two laboratory periods per week. The methodology of environmental impact statement preparation from initial collection of data to final

report drafting is covered. The course is problem-oriented; students are taught to take the initiative in EIS preparation.

**BIOL 50703 Ecology of Lakes and Streams.** Prerequisite: BIOL 30403 or permission of instructor. Two hours of lecture and one laboratory period per week. Study of the physical, chemical and biological factors affecting the ecology of lakes, ponds and streams.

**BIOL 50713 Marine Ecology.** Prerequisite: BIOL 30403 or permission of the instructor. Two hours of lecture and one laboratory per week. A study of marine communities and factors that influence the distribution of marine organisms. At least one field trip to the Texas coast to sample marine communities. Samples collected during the field trip will be analyzed by students in the laboratory.

**BIOL 50741 Data Analysis With Dos.** Prerequisite: 3 hours of statistics or permission of the instructor. One hour lecture and laboratory as arranged. The methodology of acquisition and interpretation of biological data, including sampling theory, data formatting, basic statistical analyses and computer interfacing.

**BIOL 50773 Introduction to Environmental Law.** Three hours lecture per week. Introduction to and analysis of selected federal statutes regulating environmental degradation and environmental clean-up, including the National Environmental Policy Act and regulation of air quality, water quality, wastes, hazardous and toxic substances and enforcement.

**BIOL 50803 Ecology of Fishes.** Prerequisite: BIOL 30403 or permission of instructor. Two hours of lecture and one laboratory period per week. Ecology of fishes, basic techniques of fisheries management.

**BIOL 50813 Medical Mycology.** Three hours lecture per week. Prerequisites: BIOL 30303 20233, CHEM 30123, 30133, or approval of instructor. Study of the causative etiological agents of the systemic mycoses, their isolation and identification.

**BIOL 50883 Introduction to Environmental Engineering Technology.** Introduction to fundamentals of pollution control technology; impact of federal and state legislation on the construction, modification and control of industrial plants. Other topics include hazardous pollutants, modification to ambient quality, and basic pollution modeling. Also offered as GEOL 50883.

**BIOL 50903 Tropical Biology.** Two hours lecture per week, one week of field work in the tropics and a terminal project. Prerequisites: Six semester hours in Biology; travel costs are exclusive of tuition; permission of instructors. Systematics and ecology of tropical marine invertebrates and terrestrial vertebrates with emphasis on Cnidarians, Arthropods, Mollusks and Reptiles.

**BIOL 50910 Biology Seminar.** 1.) The primary goal is to acquaint the student with the preparation and presentation (oral and/or written) of scientific information from the biological literature. May be repeated for credit with different topics to a maximum of 3 times (one semester hour per topic). 2.) Acquainting the student with the preparation and presentation (oral and/or written) of scientific information from the biological literature. May be repeated for credit with different topics to a maximum of 3 times. (One semester hour per topic.)

**BIOL 50923 Herpetology.** One hour lecture and two-three hour laboratories per week. Prerequisite: Permission of the instructor. Classification, laboratory, and field identification and seminars on natural history, ecology, evolution and behavior of reptiles and amphibians.

**BIOL 60000 The Teaching of Biology.** Three to six semester hours. Seminar in methods of teaching Biology and supervised classroom and laboratory teaching. Open to students who are Teaching Assistants or National Science Foundation Trainees.

**BIOL 60001 Scientific Presentation.** The goal of this course is to acquaint the student with the organization, preparation and effective delivery of scientific seminars. ALL BIOLOGY GRADUATE STUDENTS ARE REQUIRED TO TAKE THIS COURSE.

**BIOL 60011 Research in the Biological Sciences.** One hour lecture per week introducing students to various aspects of biological research including scientific publication, grantsmanship and research approaches. All Biology graduate students are required to take this course.

**BIOL 60123 Electron Microscopy.** Prerequisites: Biology 50133, 50143 or permission of instructor. Cell ultrastructure with special emphasis on preparative techniques useful in the study of functional morphology of cells.

**BIOL 60223 Medical Bacteriology.** Prerequisite: Biology 30303 or equivalent. Nature of virulence, types of pathogenic organisms, epidemiology and disease control.

**BIOL 60243 Advanced Immunology.** Three hours lecture per week. Prerequisite: Biology 30303 20233, 40253 or approval of instructor. Immunobiology and immunochemistry of the immune response, especially cell mediated reactions. Current literature, techniques and clinical applications.

**BIOL 60603 Virology.** Prerequisite: Six hours of biochemistry or permission of instructor. Fundamental properties of viruses and contribution of viral studies to molecular biology.

**BIOL 60723 Advanced Genetics.** Three hours lecture per week. Prerequisite: BIOL 30303, 40123, 50133 or approval of instructor. Examination of research literature dealing with selected topics in genetics. Topics in molecular genetics are most common. May be repeated for credit one time with different topic.

**BIOL 60910 Biology Seminar.** Prerequisite: BIOL 60001 or permission of instructor. The primary goal is to acquaint the student with areas of study in the biological sciences not covered in detail in other courses.

**BIOL 70003 Environmental Internship.** Students must spend at least 135 hours in approved practical work experience with an organization or company approved by the TCU MBA/MA Program. Open only to MBA/MA students.



**BIOL 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**BIOL 70950 Assigned Problems in Biology.** Limit 3 hours unless approved by graduate committee or department chair. This course is designed to give graduate students special projects in the various areas of biology indicated. Each of the assigned projects requires a minimum of 50 clock hours of field, laboratory or library work for each semester hour of credit.

**BIOL 70980 Thesis.** Prerequisite: Admission to candidacy. Continuation of 7680

**BIOL 70990 Thesis.** Prerequisite: Admission to candidacy. Continuation of 70980.

# Chemistry

[Graduate Program for the Ph.D. Degree](#)

[Graduate Program for the M. A. or M. S. Degree](#)

[Courses of Instruction](#)

## Graduate Program for the Ph.D. Degree

The Ph.D. Degree program in chemistry is comprised of the following components.

1. *Lecture courses* to provide the student with extensive depth and breadth of knowledge in major areas of chemistry.
  2. A *seminar program* designed to supplement the traditional course program with presentations given both by visiting scholars and by TCU students and faculty. Graduate students are required to present one departmental seminar on a topic selected from the current literature but not related to his/her research. This is normally given in the third semester and a second seminar describing the student's Ph. D. work is given in the last semester in residence.
  3. A *cumulative examination program* designed to inform the faculty of the student's knowledge and ability in his or her field and to guide the student in his or her own development. These examinations are given four times per semester during the academic year in the areas of inorganic, organic, physical chemistry and biochemistry. In general, they are based on advanced course work and/or the current chemical literature. A student is expected to begin taking cumulative examinations no later than the beginning of the third semester. Once the cumulative examinations are begun, the student must pass three during the first three semesters and a total of five within four semesters. Part-time students should consult with their faculty adviser concerning time limitations associated with the cumulative examinations.
  4. An *original research proposal* covering a feasible research plan within their area of interest but outside their current research efforts. The proposal is to be evaluated by a given student's supervisory committee on a pass/fail basis, defended in oral presentation before the supervisory committee, and should be completed by the end of the semester following completion of the cumulative exams. Upon completion of the proposal defense, a student is formally admitted to candidacy for the Ph.D. degree. Admission to candidacy must occur at least one full semester before graduation.
  5. A *teaching experience* that is considered an important part of the graduate training program. Each student is required to participate in four semesters of teaching, normally as an assistant in an undergraduate laboratory course. During these semesters he/she will be enrolled in CHEM 50120.
  6. A *dissertation* that is based upon the successful completion of an original research project. Each student will defend the dissertation in an oral examination before his/her supervisory committee.
- The following is a complete list of courses offered by this department. Go to Class Search to see which courses are being taught this semester.

## Overview

Available on the Master of Arts, Master of Science and Doctor of Philosophy Degrees.

**Prerequisites:** A baccalaureate degree in Chemistry from an approved college or university with an academic record meeting the standards established by the University. Students who have majored in related areas will be considered if it is believed that the relevant undergraduate chemistry background can be acquired during the first year of graduate study.

**General Requirements:** All graduate students must satisfy the core course requirements in three out of four areas of chemistry. This may be accomplished through placement examination or coursework. Courses are selected from the following: Biochemistry (50133), Organic Chemistry (50223), Physical Chemistry (50282 and 50291), and Inorganic Chemistry (50163). A student may satisfy the requirement by making a grade of "B" or better in the appropriate course or by successfully passing examinations in the fields. The examinations are at the level expected for an ACS-certified B. S. degree. Normally, these examinations are given during the week prior to the beginning of the fall and spring semesters. A student may take a given examination no more than twice. All graduate students must satisfy the requirements in two areas within the first 12 months and all three requirements by the end of the second year. The progress of each graduate student is evaluated at the end of each semester. All students are to participate in a departmental seminar program.

All graduate students are required to complete satisfactorily a course in laboratory safety.

**Graduate Record Examination:** The examination must be taken by all entering graduate students. Normally, a student must submit the results of the exam to the chemistry department before being admitted. In all cases the examination must be taken before the end of the student's first semester residence in the program.

The time required for part-time students to meet requirements may be modified upon recommendation of a committee composed of the chair and two faculty advisers.

## Graduate Program for the M. A. or M. S. Degree

**M. S. (thesis option):** A total of at least 30 approved hours including at least 15 in chemistry and 6 in thesis. Each student will defend his/her thesis in an oral examination.

**M. A. (non-thesis option):** A total of 36 approved hours including at least 24 in chemistry with no more than 6 hours of credit in Chemistry 50120, 50230, 60110, 60240, 60260, 60270 and 60280. Each student is also

required to pass an oral examination based upon his/her program of study.

The teaching experience is considered an important part of the graduate training program. Each student is required to participate in a minimum of two but usually no more than four semesters of teaching.

### Courses of Instruction

**CHEM 50001 Laboratory Safety.** Required of all graduate students in chemistry, this course deals with the safe handling of chemicals, the inventory and safe disposal of chemicals, safe handling of radioactive materials and lasers as well as details of federal, state and city regulations that apply to safety in academic and industrial laboratories. The course is also required of students who will be handling radioactive materials and is highly recommended for all other graduate students in the physical sciences.

**CHEM 50111 Laboratory Glassblowing.** One 4-hour laboratory period per week. An introduction to the preparation of laboratory research equipment constructed of sodium and borosilicate glass.

**CHEM 50120 Teaching of Chemistry.** Prerequisite: Permission of the instructor. Members of this class act as Chemistry laboratory assistants. Techniques of laboratory instruction are illustrated and the importance of laboratory safety is stressed. 1-3 semester hours.

**CHEM 50133 Biochemistry.** See Biology 50133 Prerequisite: CHEM 30133, 40113 or permission of the instructor. Three lecture hours per week. A general survey of structure and function of biologically important compounds with methods of analysis.

**CHEM 50143 Biochemistry.** See Biology 50143 Prerequisite: CHEM or BIOL 50133. Biosynthesis, replication of DNA, synthesis and processing of RNA and proteins, and special topics e.g. brain and muscle functions, hormones and signal transduction, cancer, development, etc.

**CHEM 50162 Advanced Inorganic Chemistry Laboratory.** One hour lecture and one 4-hour laboratory per week. Prerequisite: CHEM 50163 or concurrent registration. The laboratory emphasizes the synthesis, characterization and transformations of inorganic species.

**CHEM 50163 Advanced Inorganic Chemistry.** Three hours lecture per week. Prerequisite: CHEM 40123 or permission of the instructor. A survey of topics in modern inorganic chemistry with emphasis on synthesis, bonding and the mechanisms of reactions.

**CHEM 50173 Chemical Instrumentation.** Two hours lecture and one 4-hour laboratory per week. Prerequisite: Prior or concurrent registration in Chemistry 40123. Modern instrumental techniques applied to both inorganic and organic systems. Ultraviolet, infrared and nuclear magnetic resonance spectroscopy, vapor phase chromatography, polarography and various electrochemical methods of analysis are covered.

**CHEM 50182 Biophysical Chemistry Laboratory.** Two 4-hour laboratory periods per week. Prerequisite: Prior or concurrent registration in CHEM 50183. Physical chemical principles applied to biochemical systems.

**CHEM 50183 Biophysical Chemistry.** Three hours of lecture per week. Prerequisite: CHEM 40113 and prior or concurrent registration in CHEM 50143. Biological systems are discussed from the viewpoint of physical chemical theories and methods.

**CHEM 50223 Advanced Organic Chemistry.** Three hours lecture per week. Prerequisite: Chemistry 30132, 30133 or permission of instructor. A detailed study of stereochemistry, important organic reactions and mechanisms, organic syntheses and fundamentals of synthetic design.

**CHEM 50230 Special Problems in Chemistry.** Advanced work in biochemistry, inorganic, organic and physical chemistry to be determined by the previous preparation and interests of the individual student.

**CHEM 50263 Physical-Organic Chemistry.** Three hours lecture per week. Prerequisite: CHEM 30133 and prior or concurrent registration in CHEM 40123. An introduction to modern structural theory and reaction mechanism. Includes a discussion of physical methods.

**CHEM 50273 Inorganic Reactions.** Three hours of lecture per week. Prerequisite: CHEM 50163 or permission of the instructor. An advanced study of the preparative and derivative chemistry of important classes of transition metal and main group element compounds.

**CHEM 50282 Advanced Physical Chemistry.** Two hours lecture per week. Prerequisite: Chemistry 40123. An introduction to Quantum Chemistry and Statistical Thermodynamics is presented. Continuation of Chemistry 40113-40123.

**CHEM 50290 Chemical Thermodynamics.** Prerequisite: Chemistry 40113 or permission of instructor. An introduction to the applications of thermodynamics in chemistry. 1-3 hours of variable credit

**CHEM 50303 Chemical Kinetics.** Three lecture hours per week. Prerequisite: CHEM 40123. Phenomenological and theoretical aspects of the subject are stressed. Emphasis is placed on the study of rates of reaction as a means of elucidating reaction mechanisms. The study of specific gas phase and solution reactions is undertaken to illustrate basic theoretical principles as well as to distinguish molecular, ionic and free radical pathways, applications of isotope effects, activation parameters, medium effects and linear free-energy relationships are considered. Selected topics in conventional and enzyme catalysis are discussed.

**CHEM 50502 Biochemistry Laboratory.** See Biology 50502 Two four-hour laboratory periods per week. Prerequisite: CHEM 50143 or concurrent registration.

**CHEM 50783 Environmental Chemistry.** Prerequisites: CHEM 10114-10124 or permission of the instructor. Three hours of lecture per week. Chemistry of water, soil, energy, and air as related to environmental problems. Subjects include: nutrients and eutrophication, fluorocarbons, sulfur and nitrogen oxides, Eh-pH relationship, natural

carbonate reactions, and cation exchange phenomena. Cross listed with GEOL 50783.

**CHEM 50993 Neurochemistry.** Three lecture hours per week. Prerequisite: CHEM 50133 or permission of instructor. The elucidation of biomedical phenomena that subserve the characteristic activity of the nervous system or are associated with neurological diseases.

**CHEM 60110 Seminar.** Chemistry seminar.

**CHEM 60120 Special Topics in Inorganic Chemistry.** Prerequisite: CHEM 50163 or permission of instructor. Significant advances in inorganic chemistry with emphasis upon material taken from recent literature. The subject matter will be fitted to the needs and interests of the class.

**CHEM 60123 Chemistry of Heterocyclic Compounds.** Prerequisite: CHEM 50223 or equivalent. The synthesis and reactions of the principle heterocyclic systems, including some related natural products.

**CHEM 60130 Special Topics in Biochemistry.** Prerequisite: CHEM 50143. Specialized aspects and new developments in the field.

**CHEM 60140 Special Topics in Organic Chemistry.** Prerequisite: Chemistry 50223 or equivalent. Recent advances in theoretical and synthetic organic chemistry. Highly specialized areas of organic chemistry may be taken up according to the needs of the class.

**CHEM 60150 Special Topics in Physical Chemistry.** Prerequisite: Permission of the instructor. Topics of current interest in physical chemistry. The subject matter will be selected to meet the needs and interests of the class.

**CHEM 60240 Graduate Research in Inorganic Chemistry.** Graduate research in inorganic chemistry.

**CHEM 60260 Graduate Research in Organic Chemistry.** Graduate research in organic chemistry.

**CHEM 60270 Graduate Research in Physical Chemistry.** Graduate research in physical chemistry.

**CHEM 60280 Graduate Research in Biochemistry.** Graduate research in biochemistry.

**CHEM 60313 Quantum Chemistry.** Prerequisite: CHEM 50282, Differential Equations is recommended. A brief review of the physical and historical background of quantum theory. The mathematical formalism along with some exactly solvable problems. Considerable time is spent on the approximate methods which are most applicable to chemical systems and allow a qualitative understanding of delocalization energies, spectra and chemical reactivity.

**CHEM 60323 Quantum Chemistry.** Prerequisite: CHEM 50282, Differential Equations is recommended. A brief review of the physical and historical background of quantum theory. The mathematical formalism along with some exactly solvable problems. Considerable time is spent on the approximate methods which are most applicable to chemical systems and allow a qualitative understanding of delocalization energies, spectra and chemical reactivity.

**CHEM 60333 Statistical Mechanics.** Prerequisite: CHEM 50290. After a brief mathematical introduction, the equilibrium theory of statistical mechanics is developed and used to interpret the laws of thermodynamics from the molecular standpoint. A detailed study of the relationships between the thermodynamic functions of gases, liquids and solids and their structure on the molecular scale.

**CHEM 60500 Seminar in Chemistry of Behavior.** Prerequisite: Departmental approval. Weekly discussions of current topics in the Chemistry of Behavior. Same as Psychology 60500.

**CHEM 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**CHEM 70980 Thesis.** Thesis

**CHEM 70990 Thesis.** Prerequisite: Admission to candidacy. Continuation of 70980.

**CHEM 90000 Postdoctoral Research.** Postdoctoral Research.

**CHEM 90980 Dissertation.** Prerequisite: Written permission of the Chair of the Department.

**CHEM 90990 Dissertation.** Prerequisite: Admission to candidacy. Continuation of 90980. A minimum of 12 hours of dissertation is required.

# Environmental Sciences

[Thesis Program: \(30 semester hours\)](#)

[Non-Thesis Program: \(36 semester hours\)](#)

## Overview

Available on the Master of Science degree

**Prerequisites:** Bachelor's degree with a major in Biology or Geology, or the equivalent or a major in one of the other sciences, or engineering, or one of the social sciences. Students with undergraduate preparations different from these will be considered after careful review.

The student must have completed at least one year of biology, one semester of physical geology, one year of chemistry, and one semester of calculus. Satisfactory scores on the aptitude section of the Graduate Record Examination are required.

Students pursuing a Master of Science in Environmental Sciences must complete 30 semester hours with thesis or 36 semester hours without a thesis. These semester hours, thesis or non-thesis, must include nine semester hours with *EITHER* an ecology *OR* earth resource emphasis, two semester hours of computer courses, and one hour of seminar. The remainder include 12 semester hours of electives (with thesis) and six semester hours thesis, or 24 semester hours of electives without a thesis. The nine semester hour emphasis courses must be selected from either of the following groups:

### Thesis Program: (30 semester hours)

#### *Ecology Emphasis Courses (9 sem hrs)*

Biology 50103 - Terrestrial Ecosystems (fall, odd years)

Biology 50313 - Biogeography (spring, odd years)

Biology 50703 - Ecology of Lakes & Streams (spring, even years)

Biology 50713 - Marine Ecology (fall, even years)

OR

#### *Earth Resource Emphasis Courses (9 sem hrs)*

Geology 50493 - Hydrology (every fall)

Geology 50712 - Environmental Geology (fall, even years)

Geology 50721 - Geographic Information Systems (fall, even years)

Geology 50731 - Remote Sensing Technology (fall, odd years)

Geology 50741 - Image Processing (fall, odd years)

Geology 50751 - Image Interpretation (fall, odd years)

Geology 50783 - Environmental Chemistry (Spring, odd years)

#### *Computer Courses (0-2 semester hours - can be waived if computer competent)*

Proficiency in Macintosh and Windows Computers and Applications (may be fulfilled by course work or waived if competent.

Geology 50901 - Computer Applications in Geology (Macintosh)

#### *Seminar (1 semester hour)*

A one semester hour course in which selected topics of major environmental issues will be addressed. Students will receive instruction in how to prepare and present scientific seminars.

#### *Thesis (6 semester hours)*

An appropriate research topic should be selected by the end of the student's first year of graduate work.

#### *Electives (12-14 semester hours)*

The electives are selected with the approval of the Director and/or the major professor.

### Non-Thesis Program: (36 semester hours)

A 36 semester hour Non-Thesis Program M.S. degree is also available. This option requires 24-26 semester hours of electives plus the above requirements.

**Administration and Counseling:** An advisory committee of three faculty appointed by the chair of the Departments of Biology and Geology is responsible for evaluating applicants and advising the director of the program. At least one environmental sciences faculty member must be on all graduate committees. Students may obtain counseling and/or information from Dr. Leo Newland, Room 248, Sid W. Richardson Physical Sciences Building, or from the chair of the Department of Biology or Geology. Programs for individual students will be prescribed by personal counseling, taking into account the student's background and objectives.

# Geology

## [Courses of Instruction](#)

### Overview

Available on the Master of Science degree.

### Program for the M.S. Degree

**Prerequisites:** B.A. or B.S. degree from an acceptable college or university with an academic record meeting the standards of the University.

Students who have majored in an area other than geology may be admitted if undergraduate deficiencies can be removed within a reasonable time. An applicant's academic record should demonstrate a knowledge both of the other sciences necessary to the field of concentration and of mathematics through differential and integral calculus. If these areas are deficient, the student may be counseled to take non-credit background courses.

**Graduate program:** Total of at least 30 approved hours including at least 12 in geology (of which 3 must be in Geology 60710) and 6 in thesis; approved electives or 9-hour minor in a related field is optional.

### Courses of Instruction

**GEOL 50113 Soils.** Two hours lecture and two hours laboratory per week. This course covers the formation, distribution, and classification of soils: major soil properties; field evaluation of soils; the use of soil survey information; and soil hydrology. The emphasis is on the study of soils as products of biophysical processes, and on soil properties of interest to geoscientists and natural resource managers.

**GEOL 50233 Optical Mineralogy and Petrography.** Prerequisite: permission of the instructor. Two hours of lecture and one three hour laboratory period per week. Analysis of the behavior of light in crystalline substances, complete treatment of crystal optics and the identification of non-opaque, rock-forming minerals using immersion media and thin section techniques. Intensive use of the microscope required.

**GEOL 50251 Scanning Electron Microscopy.** Prerequisite: permission of the instructor. Use of the S.E.M. in geological applications.

**GEOL 50331 Basic Seismics.** Prerequisites: GEOL 40223. Three hours of lecture per week for five weeks. An introduction to techniques of gathering, processing and interpreting seismic data.

**GEOL 50341 Interpreting Seismic Data.** Prerequisite: GEOL 40223. Three hours of laboratory per week for five weeks. A practicum in interpreting seismic data. Prerequisites: GEOL 50331 or equivalent.

**GEOL 50351 Seismic Stratigraphy.** Prerequisites: GEOL 50331 or equivalent. Three hours of lecture per week for five weeks. An introduction to the principles of seismic stratigraphy and their application in oil and gas exploration.

**GEOL 50361 Basic Well Log Interpretation.** Prerequisite: GEOL 40223. Three hours of lecture per week for five weeks. An introduction to the use of borehole geophysical logs in formation evaluation, correlation and subsurface facies analysis.

**GEOL 50413 Global Tectonics and Basin Analysis.** Prerequisite: permission of the instructor. Three hours of lecture per week. Explores the relationship between plate motion and the evolution of sedimentary basins.

**GEOL 50423 Petroleum Geology.** Prerequisite: permission of the instructor. Origin, migration and entrapment of hydrocarbons, exploration and production techniques used in the petroleum industry.

**GEOL 50433 Coastal Processes.** Two hours of lecture and one two-hour laboratory per week. Advanced study of waves, winds, water levels, tides and currents and their interaction with shores, beaches, inlets, inner continental shelves and coastal structure. Other topics include tectonic, physical, climatic controls on coastline development, storms, and sediment transport in the coastal zone. Involves computer modeling. Required field trip to the Texas barrier islands.

**GEOL 50493 Physical Hydrogeology.** Prerequisite Geol 10113 and permission of instructor. Two hours of lecture and two hours of laboratory per week. A study of the occurrence, movement, and exploitation of water in the hydrologic cycle including surface-atmosphere, groundwater, and surface water processes.

**GEOL 50543 Sedimentary Environment and Facies.** Prerequisite: permission of the instructor. Three hours of lecture per week. Facies analysis and facies models applied to the problem of interpreting stratigraphic sequences and reconstructing paleogeography.

**GEOL 50602 Preparation of Environmental Impact Statements.** See Geology 50602 Two laboratory periods per week. The methodology of environmental impact statement preparation from initial collection of data to final report drafting is covered. The course is problem-oriented; students are taught to take the initiative in EIS preparation.

**GEOL 50603 Introduction to Geochemistry.** Prerequisite: CHEM 10114-10124 or permission of the instructor. Three hours of lecture per week. Application of basic chemical principles to understanding the origin, distribution and migration of chemical elements in the earth's lithosphere, hydrosphere, atmosphere and biosphere.

**GEOL 50613 Igneous and Metamorphic Petrology.** Prerequisite: GEOL 50233, or permission of instructor. Two hours of lecture and one three hour laboratory period per week. Petrogenesis of igneous and metamorphic rocks

based on field, petrographic, chemical and isotopic data. Inferences on the evolution and dynamics of the crust and mantle. Involves use of microscope.

**GEOL 50623 Volcanology.** Prerequisite: GEOL 50233. or permission of instructor. Two hours of lecture and one three hour laboratory period per week. Types and processes of volcanic eruptions; characteristics of modern volcanic products; recognition and significance of ancient volcanic deposits in the stratigraphic record. Involves use of microscope. Field trip required.

**GEOL 50712 Environmental Geology.** Prerequisite: permission of the instructor. Three hours of lecture per week for ten weeks. Geologic processes, earth resources and engineering properties of crystal materials in the activities of society.

**GEOL 50721 Geographic Information Systems.** Prerequisite: permission of the instructor. Three hours of lecture per week for five weeks. An introduction to computer systems for creating and managing large data bases and to techniques for displaying and interpreting layered environmental geologic data.

**GEOL 50731 Remote Sensing Technology.** Prerequisite: Permission of the instructor. Three hours of lecture per week for five weeks. An introduction to the technology used in remote sensing, including MSS, TM and SPOT, thermal scanners and radar imaging.

**GEOL 50741 Image Processing.** Prerequisite: permission of the instructor. Three hours of lecture per week for five weeks. An introduction to processing techniques used to enhance the display of remote sensing images with emphasis on those techniques useful in resource mapping.

**GEOL 50751 Image Interpretation.** Prerequisite: permission of the instructor. Three hours of lecture per week for five weeks. Geologic and resource mapping and environmental monitoring using satellite images.

**GEOL 50762 Advanced Geographic Information Systems.** Prerequisite: GEOL 50721. Hands-on computer use to demonstrate advanced computer techniques for mapping. Introduction to Mapfactory, ERDAS and ArcView software programs to conduct raster and vector database layering projects for geological and environmental map production.

**GEOL 50773 Introduction to Environmental Law.** Three hours lecture per week. Introduction to and analysis of selected federal statutes regulating environmental degradation and environmental clean-up, including the National Environmental Policy Act and regulation of air quality, water quality, wastes, hazardous and toxic substances and enforcement.

**GEOL 50783 Environmental Chemistry.** Prerequisites: CHEM 10114-10124 or permission of the instructor. Three hours of lecture per week. Chemistry of water, soil, energy, and air as related to environmental problems. Subjects include: nutrients and eutrophication, fluorocarbons, sulfur and nitrogen oxides, Eh-pH relationship, natural carbonate reactions, and cation exchange phenomena. Cross listed with CHEM 40783.

**GEOL 50883 Introduction to Environmental Engineering Technology.** Introduction to fundamentals of pollution control technology; impact of federal and state legislation on the construction, modification and control of industrial plants. Other topics include hazardous pollutants, modification to ambient quality, and basic pollution modeling. Also offered as GEOL 50883.

**GEOL 50901 Computer Applications in Geology.** Prerequisites: COSC 10403 or equivalent and permission of the instructor. Three hours of lecture per week for five weeks. The use of microcomputers in Geology.

**GEOL 50912 Statistical Applications for Microcomputers.** Prerequisite: GEOL 50901. Three hours of lecture per week for ten weeks. Statistical treatment of directional data and the use of multivariate and special regression techniques analysis of variance, discriminate function analysis and factor analysis in solving geologic problems.

**GEOL 50922 Mapping Applications for Microcomputers.** Prerequisite: GEOL 50901. Three hours of lecture per week for ten weeks. Selecting and using mapping and drafting software.

**GEOL 60213 Environmental Analysis.** Two hours of lecture and one laboratory period per week. Techniques of analysis using X-ray, atomic absorption, differential thermal, infrared absorption, chromatography and liquid scintillation.

**GEOL 60413 Advanced Map Interpretation.** Prerequisites: permission of instructor. Three hours lecture per week. Techniques used in the analysis of geological structures.

**GEOL 60493 Hydrology.** Prerequisite: GEOL 50493 or permission from instructor. Two hours of lecture and two hours of laboratory per week. Principles of groundwater flow, aquifer analysis, chemical and physical properties of groundwater. Modeling of groundwater flow and contaminant transport.

**GEOL 60513 Carbonate Petrology.** Two hours lecture and one laboratory period per week. An examination of the chemical sedimentary rocks: limestones, dolomites, evaporites, chert, ironstones and phosphates, including their classification, genesis and diagenesis. The course has a large component of microscope study and fieldwork.

**GEOL 60523 Sandstone Petrology.** Two hours lecture and one laboratory period per week. Study of provenance, diagenesis and classification of sandstone using the petrographic microscope; consideration of the relationship between tectonics and sedimentation, especially sandstone composition.

**GEOL 60710 Geology Seminar.** Formal presentation and discussion of controversial topics with emphasis on geologic principles involved. For seniors with permission of instructor and graduate students.

**GEOL 70003 Environmental Internship.** Students must spend at least 135 hours in approved practical work experience with an organization or company approved by the TCU MBA/MA Program. Open only to MBA/MA students.

**GEOL 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**GEOL 70970 Special Problems in Geology.** Field or laboratory problems for graduate students in various aspects of geology. Fifty clock hours of laboratory, field or library work for each semester hour of credit.

**GEOL 70980 Thesis.** Thesis

**GEOL 70990 Thesis.** Continuation of 70980. Prerequisites: Admission to candidacy.



# Mathematics

## [Courses of Instruction](#)

### Overview

Available on the Master of Arts in Teaching degree.

### Program for the M.A.T. degree

**Prerequisites:** A baccalaureate degree with the equivalent of a major in mathematics consisting of courses through elementary calculus of one and several variables, linear algebra, and at least 8 hours of approved advanced courses.

**Graduate Program:** At the graduate level the program includes 24 hours of graduate mathematics courses and 12 hours of graduate education courses. A thesis of 6 hours may be substituted for 6 hours of the required mathematics. The MAT program totals at least 36 hours.

Mathematics course work must include: (i) 50253, 50503, and 60023, (ii) at least one of Math 50263 and 50513. All 50000-level courses count towards the MAT degree, subject to university limitations.

The required courses in Education are EDUC 60213: Advanced Educational Psychology, EDUC 60253: Historical and Philosophical Foundations of Education, EDUC 60313: Educational Assessment, and EDUC 60153: Microcomputers in Education.

### Courses of Instruction

**MATH 50073 History of Mathematics.** Prerequisite: Advanced standing in mathematics, or permission. The history of mathematics from the times of ancient Egypt and Mesopotamia until the advent of calculus in the seventeenth century.

**MATH 50073 History of Mathematics.** Prerequisite: advanced standing in mathematics or permission of the instructor. A survey of the history of mathematics from ancient times to the seventeenth century. Emphasis on topics closely related to contemporary mathematics

**MATH 50253 Abstract Algebra I.** Prerequisite: Math 10123 and Math 30224. Introduction to groups and rings. Homomorphisms, isomorphisms, subgroups, and ideals. Quotient and product structures.

**MATH 50263 Abstract Algebra II.** Prerequisites: MATH 50253. A continuation of MATH 50253. Introduction to field extensions and Galois theory. Advanced topics in groups and rings.

**MATH 50303 Studies in Geometry and Topology.** Prerequisite: Twelve semester hours of mathematics, and permission of the instructor. Topics include the topology of surfaces, convex sets, networks, and non-Euclidean Geometry.

**MATH 50303 Studies: Geometry-Topology.** Prerequisite: Twelve semester hours of mathematics, and permission of the instructor. Analytic geometry of euclidean space, topology of euclidean space and surfaces, metrics, non-euclidean geometry.

**MATH 50323 Differential Geometry.** Prerequisite: MATH 30224 and 30524. Calculus on euclidean space. Geometry of curves and spaces.

**MATH 50403 Complex Analysis.** Prerequisite: MATH 30524. Analytic functions, harmonic functions, and the Cauchy-Riemann equations. Conformal mappings. Cauchy's integral theorem and formula, with applications. Power series and analytic continuation.

**MATH 50503 Real Analysis I.** Prerequisite: Math 10123, Math 30224, and Math 30524. A rigorous development of elementary limit processes. Continuity, sequences, series, differentiation, integration.

**MATH 50513 Real Analysis II.** Prerequisite: Math 50503. A continuation of Math 50503. Multivariable calculus, including the Implicit Function Theorem and change of variables. Other selected topics.

**MATH 50613 Partial Differential Equations.** Prerequisite: Math 30613. Basic theory of hyperbolic, parabolic, and elliptic partial differential equations.

**MATH 50623 Applied Mathematics I.** Prerequisite: Math 30224, Math 30524 and Math 30613. Selected topics, such as linear and nonlinear systems, equilibria, Fourier series, computational graph theory, optimization and linear programming, calculus of variations, complex integration.

**MATH 50633 Applied Mathematics II.** Prerequisite: MATH 50623. Continuation of MATH 50623.

**MATH 50703 Number Theory.** Prerequisite: Math 10123 and Math 30224. Properties of the integers. Divisibility, prime numbers, modular arithmetic, Chinese Remainder Theorem, Diophantine equations.

**MATH 60003 The Teaching of Mathematics.** Teaching methods, including both general principles and specific techniques, and supervised teaching. Focus is on teaching topics from upper secondary level and entry level college courses.

**MATH 60023 Survey of Mathematical Problems I.** Prerequisite MATH 30224. Mathematical reasoning and proof techniques from various areas of mathematics such as Logic, Probability, Graph Theory, Number Theory, Cryptography and Constructibility.

**MATH 60033 Survey of Mathematical Problems II.** Prerequisite: MATH 60023. Mathematical reasoning and proof techniques from various areas of mathematics such as Game Theory, Set Theory, Limits, Functions, Plane Geometry and Extensions of the Real Numbers.

**MATH 60050 Foundation of Mathematics.** Prerequisite: Graduate standing in mathematics. The real number system. Set Theory. Abstract systems. (1-3 sem. hrs.)

**MATH 60053 Foundation of Mathematics.** Naive set theory, including cardinality, the Axiom of Choice, Zorn's Lemma, and other topics.

**MATH 60223 Linear Algebra.** Prerequisite: 18 semester hours of mathematics and permission. Vector spaces, linear transformations and selected topics from multilinear algebra, spectral theory and related subjects.

**MATH 60250 Theory of Numbers.** Prerequisite: MATH 30224 and permission. Topics selected from the following: The natural numbers developed from the Peano postulates. Prime number theory, including units and associates. Divisibility and integral domains. Modular arithmetic and algebra. Diophantine equations and quadratic residues. (1-3 sem. hrs.)

**MATH 60313 Topology.** Prerequisite: MATH 50503. Topological spaces, including separation properties, compactness, and connectedness. Metric spaces.

**MATH 60403 Higher Geometry.** Prerequisite: MATH 50400 or graduate standing in mathematics. The foundations of geometry. The basic concepts of Euclidean and non-Euclidean geometry. Geometric transformation. Geometric constructions.

**MATH 60500 Introduction to Approximation Theory.** Prerequisite: The equivalent of MATH 50503, and permission. Topics from the theory of uniform, or Tchebycheff approximation, including uniform approximation by polynomials and other linear families, the Weierstrass theorem and the Haar unicity theorem. (1-6 sem. hrs.)

**MATH 60653 Integral Transforms.** Prerequisite: One semester of complex analysis, or permission. Laplace transforms. Inversion formulas and methods of residues. Applications to systems of ordinary and partial differential equations. Problems in heat conduction and mechanical vibrations. Other transforms, including the Fourier.

**MATH 60970 Special Topics.** Prerequisite: Graduate standing in mathematics. (1-12 sem. hrs.)

**MATH 70200 Algebra.** Prerequisite: The equivalent of MATH 50263. Groups with operators. Modules and ideals. Elementary field theory. (1-9 sem. hrs.)

**MATH 70350 Introduction to Algebraic Topology.** Prerequisite: One semester of General Topology, and permission. Homotopy theory, including natural algebraic structures, the fundamental group of a space and covering spaces. Fibrations and higher homotopy groups. (1-6 sem. hrs.)

**MATH 70403 Projective Geometry.** Prerequisite: Graduate standing in mathematics and permission.

**MATH 70420 Differential Geometry.** Prerequisite: MATH 50513 and permission. Differential structures on manifolds. Differential forms and integration. Stokes' Theorem. Vector fields and flows. Poisson brackets and Lie derivatives. Affine connections and Riemannian metrics. Geodesics and completeness. (1-9 sem. hrs.)

**MATH 70500 Real and Complex Analysis.** Prerequisite: MATH 50513, and permission. (1-12 sem. hrs.)

**MATH 70550 Operators in Hilbert Space.** Prerequisite: A knowledge of the Lebesgue integral, and permission. Topology of Hilbert space. Projections and closed linear subspaces. General properties of normal, Hermitian and unitary operators. Compact operators. Spectral analysis of bounded and unbounded operators. Applications. (1-6 sem. hrs.)

**MATH 70653 Functional Analysis.** Prerequisite: Five semester hours of MATH 70500, and permission. Desirable: Three semester hours of topology. Linear topological spaces. Convex sets. Normed linear spaces. Banach spaces, and Hilbert spaces. Linear operators. Spectral analysis. Banach algebras and  $C^*$ -algebras.

**MATH 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**MATH 70980 Thesis.** Thesis

**MATH 70990 Thesis.** Thesis

# Physics and Astronomy

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[The Ph.D. Degree in Physics with Astrophysics Option](#)

[The Ph.D. Degree in Physics with Business Option](#)

[The M.A. and M.S. Degrees](#)

[Ph.D. Degree Requirements](#)

[Courses of Instruction](#)

## Overview

Available on the Master of Arts, Master of Science and Doctor of Philosophy degrees.

**Prerequisites:** B.A. or B.S. with a physics major, or 24-semester-hour equivalent including intermediate or advanced undergraduate courses in mechanics, electricity and magnetism, atomic and nuclear or modern physics or their equivalents. Twelve semester hours must be of junior or senior level. Required are mathematics through differential equations and a course in general chemistry. Prerequisites to a graduate minor in physics are 20 hours of physics including advanced courses in mechanics, electricity and magnetism, and modern physics or their equivalents.

Students deficient in any area of preparation may be required to take the necessary course work during the first year of graduate study. Scores on the Graduate Record Examinations are used as an aid in the overall evaluation of the applicant's graduate potential.

## The M.A. and M.S. Degrees

The M.A. degree requires 30 approved semester hours of graduate courses with a minimum of 18 semester hours in Physics and a knowledge of one foreign language. A thesis and a minor are optional. An oral exam over course work and thesis, if any, is required.

The M.S. degree requires 30 approved semester hours with a thesis or 36 semester hours without a thesis. Course requirements for the degree are: Physics 60303, 60313, three from Physics 60203, 60403, 60413, 60503 and 60603, plus a minimum of 6 additional semester hours in Physics. There is no foreign language requirement. An oral exam over course work and thesis, if any, is required.

## Ph.D. Degree Requirements

**1. Course work.** Completion of the following courses with an average grade of B or better:

Physics 60303, 60313 Quantum Mechanics

Plus four from the following:

Physics 60203, Classical Mechanics;

Physics 60403, 60413, Electrodynamics;

Physics 60503, Solid State Physics;

Physics 60603, Statistical Physics

A minimum of nine hours of Physics 60970 Research Problems must be completed with an average grade of B or better.

Additional course work may be required to ensure adequate preparation for the specified courses. Each full-time student is required to participate in graduate seminars.

The course requirements for any course other than Physics 60970, Research Problems, may also be met by satisfactory performance on a written examination administered by the faculty over the subject matter of that course, or by transfer of credit in an equivalent course from another institution.

There is no language requirement for the Ph.D. degree.

**2. Pre-dissertation qualifying exam.** This exam, which is normally taken during the fourth semester of graduate study, consists of three parts:

- a. an acceptable written report concerning either research completed at TCU or a proposal for the dissertation research including a description of any research already completed. The written report must be submitted to the graduate faculty of the department at least two weeks prior to the oral exam. Details on the required format for the report are available from the department.
- b. an oral presentation at a physics and astronomy department colloquium, usually on the subject of the written report. a comprehensive oral exam administered by the graduate faculty of the department to assess a student's preparation in basic physics and readiness to carry out the dissertation research. If the graduate faculty of the department attach a condition to passing the predissertation exam, (e.g. revision of the predissertation report or submission of additional material), the additional work must be completed by a specified deadline. The removal of the condition is subject to the approval of the graduate faculty.

The predissertation qualifying exam, in whole or in part, may be repeated once. Students who do not pass the exam are encouraged to complete the requirements for a Master's degree if they have not already done so.

Completion of the above course requirements and the predissertation qualifying exam constitute admission to candidacy for the Ph.D. degree.

**3. Dissertation.** Completion of a dissertation consisting of an original research project directed by a faculty member at TCU. Six hours of 90980 Dissertation and six hours of 90990 Dissertation are required. A final oral exam in defense of the dissertation is required and a paper based on the dissertation research must be submitted

for publication in an appropriate scientific journal.

Each full-time graduate student pursuing a degree in physics is required to participate in the undergraduate teaching function of the department. This requirement is met by assisting in undergraduate labs, giving laboratory instructions, grading papers, conducting problem sessions or offering tutorial help. The assignment varies depending on the interest and experience of the student and the degree of involvement in thesis or dissertation research, and usually amounts to 10 hours per week or less.

### **The Ph.D. Degree in Physics with Astrophysics Option**

The Ph.D. in Physics is also available with an Astrophysics option.

**Course Work.** Completion of the following courses with an average grade of B or better:

Physics 60743, Astrophysics

Physics 60303 Quantum Mechanics

Physics 60403, Electrodynamics

Plus three from the following:

Physics 60203, Classical Mechanics

Physics 60313, Quantum Mechanics

Physics 60413, Electrodynamics

Physics 60603, Statistical Physics

A minimum of nine hours of Physics 60870, Research Problems in Astronomy, must be completed with an average grade of B or better. Students in the Astrophysics option may also be required to take Physics 70743, Advanced Topics in Astrophysics, to ensure an adequate background for their dissertation research.

Except for the courses specified above, the remaining regulations concerning course work, pre-dissertation qualifying exam, and dissertation are the same as those prescribed above for the Ph.D. in Physics.

### **The Ph.D. Degree in Physics with Business Option**

The Ph.D. in Physics is also available with a Business option. Students entering the Ph.D. program with a B.S. degree are normally expected to complete the Ph.D. requirements within five years. At the end of the fourth year of graduate studies, a candidate for the Ph.D. degree in Physics who has demonstrated sufficient progress in research (dissertation), may submit a written request to the Department of Physics for admission to this program. Providing there is a clear indication that the student can reasonably be expected to complete all the requirements for the Ph.D. within five years, permission will be granted to apply to the Director of Admissions of the MBA Program of the Neeley School of Business. During the fifth year the student is expected to continue with the dissertation on a reduced scale, and, if on Departmental Teaching Assistantship, to perform designated departmental teaching duties. Students entering the Ph.D. program with advanced standing (M.S. degree or more) can request an accelerated program.

In addition to the course work, qualifying examinations, and dissertation requirements specified for the Ph.D. degree in Physics, the student will satisfy the following conditions specified by the School of Business:

1. Students electing to take the Business Option will take the 18 hours of MBA coursework over the course of two consecutive semesters (entering in the Fall and finishing in the Spring semesters).
2. Students are required to attend the START Workshop conducted by the School of Business that occurs just before the start of the fall semester. Students are assessed a fee for the workshop.
3. The School of Business will accept the results of the GRE.
4. The Director of Admissions has sole authority to admit physics Ph.D. candidates to the MBA program (whether they seek the MBA degree or the Option).
5. Under the assumption that the students come to the program with a good background in Statistics, they would take the following courses:

#### **a. Fall Semester**

1. Corporate Financial Reports
2. Interpreting Financial Reports
3. Business Strategy and Structure
4. Managing People

#### **b. Spring Semester**

1. Management of Financial Resources
2. Market Driven Strategy
3. Managing Information Technology

6. The foregoing may be adjusted in the event of a realignment in the sequence of courses in the MBA program.
7. Students who wish to continue their studies in the program after their first year of business courses and pursue the MBA degree:

- a. Will, with the approval of the Director of the MBA Program, be permitted to transfer in for credit a total of six hours of 60000 or 70000 level graduate physics course work. Transfer will be approved

for: 1. A graduate level course that is equivalent to DESC (Statistics) and 2. Other 60000 or 70000 level course work taken in the Physics Department.

b. Will be required to complete such additional coursework as required of other MBA students and as is provided in the applicable TCU Graduate Studies Bulletin. The student will work closely with the Academic Program Director to plan his/her schedule.

c. Will be required to attend (in the second year of the MBA program) four of the Industry-Led Perspective Series seminars. This series brings corporate executives to speak on some issues relevant to business. A student could satisfy this requirement the first year.

Prospective candidates for the Ph.D. Degree in Physics or the Ph.D. with Business Option should be advised that the maximum term of fellowship or assistantship support through the Department of Physics is five years, and support for MBA courses from the TCU Physics Department fellowships or assistantship is limited to 18 hours. Financial support for additional hours required for completion of the MBA degree would be the student's responsibility; students would be eligible to apply for financial aid for the second year of MBA study from the Neeley School of Business.

### Courses of Instruction

**PHYS 50030 Seminar in Contemporary Physics.** Prerequisite: Permission of instructor. Students enrolled will be expected to participate in, prepare, and lead discussions on selected topics in physics as suggested by the current journal literature. (1-4 sem. hrs.)

**PHYS 50703 Nonlinear Dynamics.** Prerequisite: permission of the instructor; PHYS 30553 is recommended. Characterization of Chaos, Routes to Chaos, Dissipative Dynamical Systems, Hamiltonian Systems.

**PHYS 50713 Contemporary Topics in Physics.** Prerequisite: Departmental permission. Regularly scheduled course on a subject of interest to students and faculty. Possible topics: Acoustics, Biophysics, Mathematical Physics, Modern Optics, and Nuclear Physics.

**PHYS 50723 Introduction to Solid State Physics.** Prerequisite: PHYS 30493; MATH 30524. Crystal structure, lattice dynamics, free electron theory, band theory, optical, electric and magnetic properties of solids.

**PHYS 50733 Computational Physics.** Prerequisites: PHYS 20483 and MATH 30524. Computational methods used in physics, systems of linear equations, eigenvalues problems, numerical solution of differential equations using different computer environments such as IBM PC, Macintosh, SUN workstation.

**PHYS 50743 Astrophysics.** Prerequisite: Departmental permission.. The distance scale, applications of dynamics, statistical mechanics, relativity and quantum theory to astrophysical phenomena, theory of stellar structure, processes in the interstellar medium and selected topics in cosmology.

**PHYS 50970 Special Problems in Physics.** Prerequisite: Departmental permission. Advanced work in physics the nature of which is to be determined by the previous preparation and interest of the individual. Credit will depend upon the nature of the study and the amount of work taken. 1-12 hrs.

**PHYS 60203 Classical Mechanics.** Prerequisites: Physics 30553 or equivalent. Variational principles and Lagrange equations, rigid body motion, Hamiltonian mechanics, canonical transformation, Lagrange and Poisson brackets, Hamilton- Jacobi theory, continuous systems and fields.

**PHYS 60303 Quantum Mechanics.** Prerequisite: Physics 40113 or equivalent. Foundations of quantum mechanics, with applications to atomic and nuclear physics.

**PHYS 60313 Quantum Mechanics.** Prerequisite: Physics 60303. Continuation of 60303.

**PHYS 60403 Electrodynamics.** Prerequisite: Physics 40653 or equivalent. Electrostatic and magnetostatic fields. Time-dependent electromagnetic phenomena. Maxwell's equations and general electrodynamic theorems derivable therefrom. Electromagnetic radiation. Covariant formulation of the electromagnetic field equations.

**PHYS 60413 Electrodynamics.** Prerequisite: Physics 60403 or permission of instructor. This is a second part of the two semester course. It includes electromagnetic radiation, coherent optics, diffraction, Fourier optics, wave guides, lasers and discussion of non-linear phenomena.

**PHYS 60503 Solid State Physics.** Prerequisite: Physics 60303, 60313 and 50723 or equivalent. Symmetry and crystal structure, ionic and covalent bonds, metals, band theory, thermal and optical effects in solids, and selected topics on magnetic properties, superconductivity and surface science.

**PHYS 60603 Statistical Physics.** Prerequisite: Physics 30603 or equivalent and Physics 60203, 60313. General principles, kinetic theory, partition functions, Bosons and Fermions, linked cluster expansions, distribution functions, Brownian motion.

**PHYS 60743 Astrophysics.** Prerequisite: Departmental Permission. Origin and interpretation of stellar spectra. Energy generation and transport, nucleosynthesis. Stellar structure and stellar evolution. Interstellar medium, nebulae. Galaxies. Cosmology.

**PHYS 60870 Research Problems in Astronomy.** Prerequisite: Departmental Permission. Directed research in the following areas: Observational astronomy, Galaxy structure and evolution, Stellar populations, Large-scale structure

**PHYS 60960 Physics Seminar.** Prerequisite: Graduate standing in Physics or approval of instructor. Participation

in graduate colloquium and occasional presentation of appropriate topics to graduate faculty.

**PHYS 60970 Research Problems.** Directed research in the following areas: Atom optics, Electron-atom collisions, Molecular and solid state physics, Statistical physics, Positron annihilation spectroscopy

**PHYS 70133 Atomic Collision Physics.** Prerequisite: PHYS 60303 and 60313. Theoretical, computational and experimental techniques used in electron, photon, atomic and molecular collision physics.

**PHYS 70203 Nuclear and Particle Physics.** Prerequisite: PHYS 60313. Nuclear and particle classifications and properties; nuclear two-body problem; nuclear models; passage of radiation through matter; detection methods and accelerators; nuclear and particle spectroscopy; gamma decay, beta decay and the weak interactions, Kaons, particle resonances; nuclear reactions; experiments at high energy.

**PHYS 70303 Advanced Quantum Mechanics.** Prerequisite: PHYS 60313. An introduction to the relativistic Dirac theory of the electron and to the non-relativistic quantum mechanical many-body problem.

**PHYS 70413 Statistical Physics.** Prerequisite: PHYS 70403. Lattice statistics, critical phenomena, propagators and methods for distribution functions, transport phenomena and irreversibility, second quantization and Green's functions.

**PHYS 70503 Molecular Physics.** Prerequisite: Graduate standing in physics or approval of instructor. Electronic, vibrational and rotational spectroscopy of polyatomic molecules. Applications of group theory to molecular spectra and structure. Fourier transform laser, electron paramagnetic resonance and other spectroscopic techniques.

**PHYS 70703 Chemical Physics.** Prerequisite: PHYS 60303. Quantum Chemistry, structure of molecules and intermolecular forces, molecular relaxation processes, light scattering, nonlinear optical methods, molecular beams, NMR and other experimental techniques.

**PHYS 70743 Advanced Topics in Astrophysics.** Prerequisite: Physics 60870 or Departmental Permission. Regularly scheduled course on advanced topics in astronomy and astrophysics, including the following: Stellar Atmospheres: Basic methods and applications of radiative transfer. Theory and interpretation of astronomical spectra: line profiles, LTE and non-LTE line formation, abundances, model atmospheres, curve-of-growth. Stellar Interiors: Solution of the equations of stellar structure, analytic approximations and theory relating to equilibrium stellar models, nucleosynthesis in massive stars, final phases of stellar evolution. Galactic Structure: The interstellar medium, galaxy kinematics, interacting galaxies, evolution and classification of galaxies, extragalactic radio sources, quasars, cosmological models.

**PHYS 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**PHYS 70803 Theoretical Atomic and Molecular Physics.** Prerequisite: PHYS 60303 and 60313. Theoretical study of electronic structure and molecular vibrations and rotation, Hartree-Fock and Many Body Perturbation Theory. Computer calculation of electronic structure.

**PHYS 70903 Quantum Optics.** Prerequisite: PHYS 60203 and 60213. Study of Laser Physics, interaction of light and matter, nonlinear phenomena and quantum nature of light.

**PHYS 70980 Thesis.** Prerequisite: Permission of Chair of Department.

**PHYS 70990 Thesis.** Prerequisite: Admission to candidacy.

**PHYS 80090 The Teaching of Physics at the College Level.** Prerequisite: Graduate standing in physics and approval of instructor. Supervised preparation and delivery of lectures and demonstrations, and preparation and evaluation of examinations.

**PHYS 90960 Seminar in Theoretical Physics.** Prerequisite: Graduate standing and approval of the instructor.

**PHYS 90970 Research Problems in Physics.** Prerequisite: Graduate standing and departmental permission.

**PHYS 90980 Dissertation.** Prerequisite: Permission of Chair of Department.

**PHYS 90990 Dissertation.** Prerequisite: Admission to candidacy. Continuation of 90980. A minimum of 12 hours of dissertation is required.

# Psychology

[The Master's Degree](#)  
[National Honor Society](#)  
[Courses of Instruction](#)

## Overview

Available on the Master of Arts, Master of Science and Doctor of Philosophy degrees.

**Prerequisites:** B.A. or B.S. degree, including a major in psychology or a 24-hour equivalent. Satisfactory scores on the Aptitude Tests of the Graduate Record Examination are required. Students with majors in other disciplines will be considered upon request, but may be required to make up any deficiencies in their undergraduate preparations.

**Graduate Programs:** Studies leading to a Master's or Ph.D. degree in general-experimental psychology are offered.

## The Doctoral Degree

The program leading to the Ph.D. degree has a research emphasis reflecting the study of psychology as a science rather than the therapeutic aspects of psychology. The term "research" should be interpreted broadly. The program is not limited to traditional experimental psychology, nor is it committed solely to laboratory-based methods. The Department believes that a measure of specialized knowledge-built upon a firm but broad base of psychological principles and methods-constitutes the best plan for most of its students.

Although the graduate program leads to a Ph.D. in General-Experimental Psychology, the student is expected to pursue a specialized area of research. For information about areas of research interests of the faculty, contact the Psychology Department.

Graduate students may be admitted to candidacy for the Ph.D. degree upon completion of a core course program and the demonstration of basic proficiency in scientific psychology.

## The Master's Degree

A predoctoral Master of Arts or Master of Science degree requiring a minimum of 30 approved semester hours, including at least six semester hours of thesis is available. This program is recommended for those students who plan to pursue doctoral level graduate study.

## National Honor Society

The Department of Psychology sponsors the TCU chapter of Psi Chi, national honorary society for psychology.

## Courses of Instruction

### General Studies

**PSYC 50413 History and Systems of Psychology.** Prerequisite: Senior or graduate standing in Psychology, or approval of instructor. The scientific and philosophic antecedents of contemporary psychology in relation to their current influence on the field.

**PSYC 50563 Developmental Psychology.** Prerequisite: Senior or graduate standing in Psychology, or approval of instructor. Data and research methods related to the development of the human organism from its prenatal origins through old age.

### Quantitative Methods

#### PSYC 50213 Interactive Data Analysis.

**PSYC 50411 Theoretical Foundations of Statistical Inference.** Prerequisite: Graduate standing in Psychology; Ph.D. students must take concurrently with PSYC 50423. Supplements PSYC 50423. Provides an in-depth view of the models and theories underlying analysis of variance, correlation and regression analysis, and the nonparametric techniques.

**PSYC 50423 Graduate Statistics.** Prerequisite: Senior or Graduate standing or approval of instructor. The conceptual basis of statistical inference. Topics include: analysis of variance models, correlation and regression analysis, and nonparametric techniques.

**PSYC 50523 Experimental Design.** Prerequisite: PSYC 50423 or approval of instructor. The planning and design of behavioral research including the specification of research problems, development of appropriate designs, the use of appropriate analytic techniques and the interpretation of results. Primary attention is given to analysis of variance models as analytic techniques, but multivariate techniques such as regression and discriminant function models are also considered.

**PSYC 60613 Multivariate Analysis.** Prerequisite: PSYC 50423 or approval of instructor. Multivariate correlation methods, discriminant function analysis, factor analysis and related techniques.

**PSYC 80100 Special Topics in Quantitative Methods.** Prerequisite: Departmental approval. Seminars or other special courses.

**PSYC 90100 Advanced Studies in Quantitative Methods.** Prerequisite: Departmental approval. Individual study or research.



## Learning and Motivation

**PSYC 50603 Contemporary Learning Theory.** Prerequisite: Senior or graduate standing in Psychology, or approval of instructor. Selected theoretical principles important for understanding complex behavior, and their recent extensions and application to human social behavior, autonomic and psychosomatic function, etc.

**PSYC 60553 Conditioning and Learning.** Prerequisite: Graduate standing in psychology or approval of instructor. Basic research in the field of learning, emphasizing empirical study of classical conditioning, instrumental conditioning, generalization, discrimination and extinction.

**PSYC 60561 Laboratory in Conditioning and Learning.** Prerequisite: Concurrent or prior registration in PSYC 60553, or approval of instructor.

**PSYC 60563 Psychology of Human Learning.** Prerequisite: Graduate standing in psychology or approval of instructor. A review of research methods and theories of human learning with special emphasis on the acquisition of verbal and social behavior in both children and adults.

**PSYC 60683 Advanced Comparative Psychology.** Prerequisite: Graduate standing in psychology or approval of instructor. The development of anatomical structures, environmental factors and behavior of species throughout the animal kingdom. Emphasis is on interspecies comparison and the understanding of human behavior in terms of its evolutionary antecedents.

**PSYC 60723 Motivation.** Prerequisite: Graduate standing in psychology or approval of instructor. Concepts, theories and systematic investigations of motivation, covering historic lines of development with particular emphasis on recent contributions.

**PSYC 80200 Special Topics in Learning and Motivation.** Prerequisite: Departmental approval. Seminars or other special courses.

**PSYC 90200 Advanced Studies in Learning and Motivation.** Prerequisite: Departmental approval. Individual study or research.

## Perception and Cognition

**PSYC 50583 Cognition.** Prerequisite: Senior or graduate standing in Psychology, or approval of instructor. Current topics in the area of cognition including thinking, language, memory, decision making, and problem solving.

**PSYC 60533 Perception.** Prerequisite: Graduate standing in psychology or approval of instructor. The relations of sensation and perception, stimulus and receptor correlates, phenomenological and configurational theories and the integration of perception with the phenomena of motivation and learning.

**PSYC 80300 Special Topics in Perception and Cognition.** Prerequisite: Departmental approval. Seminars or other special courses.

**PSYC 90300 Advanced Studies in Perception and Cognition.** Prerequisite: Departmental approval. Individual study or research.

## Physiological Psychology

**PSYC 50403 Advanced Physiological Psychology.** Prerequisite: Senior or Graduate standing and PSYC 30463 or approval of instructor. An in depth analysis of the neural and endocrine components of normal and abnormal behavior with emphasis on classic studies in the field.

**PSYC 50463 Fundamentals of Neuroscience.** See Psychology 50463 Prerequisite: Graduate or senior standing or approval of the instructor. The fundamentals of functional neuroanatomy and neurophysiology with an emphasis on experimental and theoretical analysis of the basic brain behavior relationships.

**PSYC 50472 Laboratory in Physiological Psychology and Neuroscience.** Prerequisite: PSYC 30463 or its equivalent or PSYC 50653 or its equivalent, or concurrent registration in either PSYC 50436 or PSYC 30463. One lecture and one laboratory per week. Emphasis will be on the laboratory techniques employed in physiological psychology and neuroscience in analyzing the neural and hormonal correlates of behavior (Also offered as BIOL 50472)

**PSYC 50482 Laboratory in Physiological Psychology and Neuroscience.** Prerequisite: PSYC 30463 or its equivalent or PSYC 50653 or its equivalent, or concurrent registration in either PSYC 50436 or PSYC 30463. One lecture and one laboratory per week. Emphasis will be on the laboratory techniques employed in physiological psychology and neuroscience in analyzing the neural and hormonal correlates of behavior (Also offered as BIOL 50482)

**PSYC 50513 Psychopharmacology.** Prerequisite: PSYC 10213, 10514, 10524, or approval of instructor. Theory and principles of behavioral and biochemical methods of assaying drug action, with primary emphasis on the study of the effects of neuropharmacological agents or endogenous systems.

**PSYC 60500 Seminar in Chemistry of Behavior.** Prerequisite: Departmental approval. Weekly discussions of current topics in the Chemistry of Behavior. Same as Psychology 60500.

**PSYC 60543 Sensory Processes.** Prerequisite: Graduate standing in psychology or approval of instructor. Energy transduction in the external and internal senses, afferent control via receptor adjustment and neural interaction, centripetal information processing and the relation of sensors to homeostatic regulation.

**PSYC 80400 Special Topics in Physiological Psychology.** Prerequisite: Departmental approval. Seminars or other special courses.



**PSYC 90400 Advanced Studies in Physiological Psychology.** Prerequisite: Departmental approval. Individual study or research.

### **Social Psychology and Personality**

**PSYC 50453 Experimental Social Psychology.** Two lectures and one laboratory period per week. Prerequisite: PSYC 3353 or its equivalent, or approval of instructor. Concepts and methods of research on attitudes, communication and persuasion, group structure, and group processes.

**PSYC 50493 Advanced Personality.** Prerequisite: Senior or graduate standing in psychology and PSYC 40443, or approval of instructor. Current topics from the empirical and theoretical literature on personality.

**PSYC 60663 Advanced Social Psychology.** Prerequisite: Graduate standing in psychology or approval of instructor. A survey of the literature of social psychology with emphasis upon recent research.

**PSYC 60823 Group Processes.** Prerequisite: PSYC 60663 or approval of instructor. Theories and systematic investigations in the social psychological literature on group processes with a historical as well as contemporary focus.

**PSYC 60833 Attitudes.** Prerequisites: PSYC 60663 or approval of instructor. Theories and systematic investigations of attitude change with a historical as well as contemporary focus.

**PSYC 80500 Special Topics in Social Psychology and Personality.** Prerequisite: Departmental approval. Seminars or other special courses.

**PSYC 90500 Advanced Studies in Social Psychology and Personality.** Prerequisite: Departmental approval. Individual study or research.

### **Special Topics**

**PSYC 60000 Special Study.** Prerequisite: Departmental approval. May be independent study or research under Code 1, or may be a special course in an area not covered in regular courses (Code 2 or higher).

**PSYC 70530 Experimental Instrumentation.** Prerequisite: Graduate standing in psychology or approval of instructor. Instruction in the design, maintenance and use of complex instruments for measuring psychological and behavioral events.

**PSYC 70980 Thesis.** Prerequisites: Graduate standing and approval of Director of Graduate Studies in Psychology.

**PSYC 70990 Thesis.** Prerequisite: PSYC 70980 and admission to candidacy.

**PSYC 80600 Special Topics in Contemporary Psychology.** Prerequisite: Departmental approval. Seminars or other special courses.

**PSYC 90600 Advanced Studies in Contemporary Psychology.** Prerequisite: Departmental approval. Individual study or research.

**PSYC 90980 Dissertation.** Prerequisite: Approval of the Director of Graduate Studies in Psychology. A maximum of 6 semester hours may be taken.

**PSYC 90990 Dissertation.** Prerequisite: 6 semester hours of PSYC 90980 and admission to candidacy for the Ph.D. degree.

### **Other Courses**

**PSYC 70130 Advanced Teaching of Psychology.** Prerequisite: Departmental approval. Supervised practice in college teaching. Note: No more than 4 semester hours in PSYC 70120 and PSYC 70130 may be applied toward the Master of Arts or Master of Science degree.

# Software Engineering

[Requirements for Admission](#)  
[Degree requirements](#)  
[Track Options](#)  
[Special Graduate Programs](#)  
[Courses of Instruction](#)

## Overview

IMPORTANT: Curriculum and degree program requirements are currently under revision. Students should check with the department to determine current requirements and available courses.

The Master of Software Engineering program offers a professional graduate curriculum in the software development discipline. Software Engineering requires that professional expertise, technical skill, and managerial ability be focused on the specification, design, implementation, and maintenance of reliable and cost-effective software systems.

## Requirements for Admission

- 1) Admission to graduate study in the College of Science and Engineering, including the GRE, and
- 2) Appropriate level of technical competence demonstrated by transcripts, resum©, at least two letters of reference, and at least one of the following:
  - (i) One or more years of experience in software systems development, knowledge of assembler language programming, programming skill using a block structured language, and an undergraduate course in data structures or its equivalent, or
  - (ii) An undergraduate degree in a computer related field such as Computer Science or Computer Engineering.

Students may resolve the block structured language and undergraduate data structures requirements by successfully completing SOEN 50104, if all other requirements for admission are satisfied.

## Degree requirements

A 31-semester hour program with at least 19 hours of SOEN courses and 12 hours of electives. The following core courses are required of all students to complete the degree: 50143, 60113, 60123, and 60153. Students will also take 3 courses from one elective track: Management, Technical Programming, or Technical Systems. One additional elective must be taken from any track. The capstone sequence 70113, 70123, 70131 is also required. Six hours of Thesis 70980-70990 may be substituted for the capstone sequence with departmental permission. Electives chosen from courses other than SOEN courses require approval of the Computer Science Department prior to course enrollment. Each student must pass a final comprehensive oral examination during the last semester of coursework.

## Track Options

### *Management*

\*SOEN 60183:Database Systems  
 MANA 60033:Managing People  
 SOEN 60043:Software Quality Assurance and Metrics  
 SOEN 60053:Software Safety, Security, and Reliability  
 SOEN 60023:Advanced Topics - Graphical User Interface Development  
 SOEN 60023:Advanced Topics - System Simulation

### *Technical (Programming)*

\*SOEN 60173:Computer Systems Architecture  
 SOEN 50123:Object-Oriented Design and Programming  
 SOEN 60023:Advanced Topics - Distributed Systems  
 SOEN 60013:Software Design and Development with Ada  
 SOEN 50503:Artificial Intelligence  
 or 60023:Expert Systems  
 SOEN 60023:Advanced Topics - Software Development with UNIX

### *Technical (Systems)*

\*SOEN 60173:Computer Systems Architecture  
 SOEN 60023:Advanced Topics - Software Development with UNIX  
 SOEN 60023:Advanced Topics - Networking  
 SOEN 60023:Advanced Topics - Distributed Systems  
 SOEN 60053:Software Safety, Security, and Reliability  
 SOEN 60183: Database Systems  
 SOEN 60023: Advanced Topics - System Simulation

\* Indicates required for this track

## Special Graduate Programs

### **Teacher Certification Programs**

Initial teacher certification may be pursued in conjunction with the Master's degree. Prerequisites include completion of the Bachelor's degree with an appropriate area of specialization or teaching field and submission of passing scores in all three areas of the TASP. The Mid-Management Certificate and Supervisor's Certificate are also available through the Educational Administration program.

Detailed information concerning these programs may be obtained from the School of Education, TCU Box 297900, Fort Worth, Texas 76129.

**Certificate Program in Music**

The Graduate Performer's Certificate in Piano is offered through the graduate area in the music department. This special performance program is designed to offer the student a more concentrated study of piano performance and therefore differs from the Master of Music degree in piano performance. A complete description of this program can be seen in the music section of this bulletin.

**Oak Ridge Associated Universities**

TCU is a member of the Council of Sponsoring Institutions of Oak Ridge Associated Universities. ORAU conducts research and educational programs in energy, health and the environment for DOE, ORAU's member institutions, other colleges and universities, and other private and governmental organizations.

The ORAU Laboratory Graduate Participation Program enables graduate students in life, physical and social sciences, who have completed all degree requirements except thesis or dissertation research, to perform full-time thesis or dissertation research under the joint direction of the major professor and a DOE staff member at a participating site. Applications for Oak Ridge Fellowships may be requested through the Office of Research and Sponsored Projects.

**Courses of Instruction**

**SOEN 50104 Programming Structures.** Prerequisite: Departmental permission. Not applicable toward degree requirements for the B.S. in Computer Science. Introduction to block structure language including scope rules, recursion, pointer variables, and control constructs. Study of data structures including arrays, stacks, linked lists, trees, graphs, and files. Examples are selected from operating systems, compilers, and systems programming. A number of programming assignments in Pascal, C, or Ada will be made.

**SOEN 50123 Object-Oriented Design and Programming.** Prerequisite: COSC 30403 or permission of instructor. Introduction to object-oriented techniques including design methodologies and programming language support. Survey of new languages and extensions to existing languages which provide support for encapsulation, inheritance, and polymorphism.

**SOEN 50143 Introduction to Software Engineering.** May be taken with SOEN 50104. An introduction to software engineering with emphasis on process models. The evolution of conceptual process models is traced from the earliest waterfall model through incremental development to present day process architectures. An overview is also given of techniques for systems analysis, software cost analysis, configuration management, quality assurance, and maintenance. Software economics, planning, and management are introduced.

**SOEN 50503 Artificial Intelligence.** Prerequisite: Knowledge of a high level programming language such as Pascal or C, and previous exposure to predicate logic. Foundations of Artificial Intelligence; topics include logic, forward and backward chaining, state-space search, expert systems and automated reasoning. Projects may utilize the Prolog, Lisp and Clips programming languages.

**SOEN 60013 Software Design and Development with Ada.** Prerequisite: SOEN 50143. Ada is used as a vehicle to study modern software design and development techniques. Special emphasis is placed on the use of abstraction, information hiding, and safe programming practices such as strong typing. The unique features of Ada, such as packages, the use of generics, and tasking, are contrasted with much "smaller" languages such as C. Proposed extensions to Ada are also examined in terms of the additional complexity and overhead that these changes incur relative to the added generality that is obtained.

**SOEN 60023 Advanced Topics in Software Engineering.** Advanced topics of current interest in software engineering, such as User Interface Development, Object-Oriented Architecture, Networking and Distributed Systems, Software Environments, Expert Systems, etc. Students will study current literature. May be repeated for credit when topic changes.

**SOEN 60043 Software Quality Assurance and Metrics.** The principles and practices related to assurance of software quality through all life cycle development phases are studied. Metrics linked to productivity and software quality assurance requirements are studied, and their use in current software development processes is reviewed by examining samples of measurement practices at successful organizations.

**SOEN 60053 Software Safety, Security, and Reliability.** A study of the problems and legal issues involved in building safety-critical software systems, secure systems, and systems that require high reliability. Similarities and differences in these problem areas and procedures to deal with them are considered using current literature, case studies, etc.

**SOEN 60113 Software Requirements and Design.** A comprehensive study of state-of-the-art techniques for requirements definition and design of software systems. Customer to contractor communication practices and specification standards are discussed. Structured analysis, PSL/PSA, and other formal methods of software requirements definition are studied. Functional decomposition, data flow, data structure, and object-oriented software design methodologies are studied. Emphasis is placed on comparing and contrasting these methodologies and on selecting a methodology appropriate to various software engineering problems. A course project provides hands-on experience with the use of Computer Aided Software Engineering CASE tools for software requirements definition and design.

**SOEN 60123 Software Generation, Testing, and Maintenance.** The concluding phases of the software lifecycle from implementation through customer support are covered. Procedural language programming and alternative methods of software generation are discussed. Formal and pragmatic methods of module testing, software integration testing, and system verification and validation are studied. Software maintenance topics are considered from the viewpoint of reducing the customer's total software lifecycle cost. The course project begun in SOEN 6113 is completed and demonstrated.

**SOEN 60153 Management of Software Development.** A comprehensive study of process considerations in software systems development. Included are software project estimating, planning, monitoring and controlling

mechanisms; leadership and team building strategies; quality assurance issues; configuration management; and maintenance considerations.

**SOEN 60173 Computers Systems Architecture.** The logical organization and functional behavior of computers are studied from the user's viewpoint. Fundamental principles in the design of the CPU, memory, and I/O devices of the traditional von Neumann architecture, and multiprocessing are addressed. Several existing multiprocessor systems are studied in detail. Substitute courses may be taken with permission of the chair or faculty advisor.

**SOEN 60183 Database Systems.** The requirements analysis and design criteria of database systems are studied with emphasis on relational databases. Design issues, including the use of normalized forms to optimize relational databases, are discussed. Students make use of the industry standard interactive command language SQL. Impacts of the operational environment, quality control, security, human/system interface requirements, systems specification and design are investigated.

**SOEN 70113 Software Implementation Project I.** This course is the first of a contiguous two-semester sequence which applies the techniques of modern software development to actual problem solutions. Group projects will be assigned, based in part on the student's professional background. The projects will require the development of operational software, emphasizing group development processes to accomplish feasibility analysis, costing, planning, requirements specifications and preliminary design of the assigned project.

**SOEN 70123 Software Implementation Project II.** Preliminary design of the project assigned in SOEN 70113 is reviewed and the detailed design is executed. A critical design review is performed and the implementation, testing, and documentation are completed as a group process. Acceptance testing is accomplished to ensure that the software satisfies the user specification requirements.

**SOEN 70131 Individual Study and Technical Communication.** Students will study some element of current coursework or a related area with the chosen faculty advisor and will prepare a technical paper of publishable quality. The paper will be submitted to an appropriate journal for publication.

**SOEN 70771 Non-Thesis.** Selected when enrolling only for non-thesis examination or preparation for the examination.

**SOEN 70980 Thesis.** Departmental permission is required.

**SOEN 70990 Thesis.** Prerequisites: 70980 and admission to candidacy.

# Office of Graduate Studies and Research

## [Courses of Instruction](#)

### Overview

#### Liberal Studies

Available on the Master of Liberal Arts degree. Administered by the Office of Graduate Studies and Research.

#### Master of Liberal Arts

The Master of Liberal Arts program is designed to offer graduate level education in the broad areas of liberal studies. It is a multidisciplinary, non-career oriented program that seeks to offer a wide range of educational opportunities to students of diverse educational backgrounds. The intent of the program is to make available to all college graduates an opportunity to satisfy their intellectual curiosity and to broaden their knowledge.

**Prerequisites.** A bachelor's degree from an accredited college or university is required for admission. Applications for admission are available in the Office of Graduate Studies and Research.

**Program.** The M.L.A. degree requires successful completion of 30 hours of course work, at least 21 of which must be taken on a letter grade basis. Twelve of the 30 hours must be in M.L.A. courses designated "Perspectives on Society." Courses so designated will relate a liberal arts discipline to a) issues of contemporary American society, b) issues of culture or cultural diversity in America, c) other world cultures and societies.

**On-Line Program.** The MLA Program offers courses that can be taken completely online. These courses are open to all MLA students. If students wish, they can complete the entire MLA Program exclusively online. No distinction is made between regular courses and online courses in terms of degree requirements or in the actual granting of the degree.

**Pass/No Credit.** At the election of the student, M.L.A. courses can be taken on a pass-no credit basis; however, no more than 9 hours taken on a pass/no credit basis will count toward the M.L.A. degree.

**Independent Study.** In exceptional circumstances, students may desire to pursue particular topics in independent study (MALA 6970) under the supervision of an M.L.A. instructor. If a student should engage in such a study, certain guidelines must be followed. A copy of these guidelines is available in the Office of Graduate Studies and Research. No more than six hours of independent study may count toward the degree.

**Transfer Credit.** Any request for transfer credit must be made on the appropriate form accompanied by a catalog course description. An official transcript of the graduate work must be mailed from the registrar's office directly to TCU. Credit may be requested only for courses broad enough in content to meet the philosophic intent of the M.L.A. program. All requests are subject to approval by the M.L.A. Advisory Committee. No more than six hours of transfer credit will be accepted. Courses, other than M.L.A., completed at TCU cannot be applied toward degree requirements.

**M.L.A. Alumni.** Alumni of the program are encouraged to continue their involvement in the M.L.A. through additional coursework, including travel/study programs, under arrangement with the Office of Graduate Studies and Research. Interested alumni should contact the office for details.

**Courses.** Courses in the M.L.A. program are offered on a rotating basis. Classes generally meet in the late afternoon and weekday evenings; occasionally, day and Saturday classes are offered. M.L.A. courses are also offered during the various summer terms. The Office of Graduate Studies and Research publishes course descriptions for the following semester. Although new courses are added each year, the following is a list of courses that have been taught in recent years. Courses preceded by an asterisk (\*) have been designated as "Perspectives on Society" core courses.

#### Courses of Instruction

##### On-Line Courses

**MALA 61013 Themes in Prehistory: Fossils, Dinosaurs and Humans.** Dinosaurs have held the public imagination for almost 200 years now. Beyond an intrinsic interest in animals that lived in an unimaginably distant time, dinosaurs and dinosaur paleontology figures greatly in the development of concepts of geologic time and biology from the Renaissance on and are still centered in the public's appreciation of 'science'. This course will take students through a tangled web of emergent concepts of time, organisms and 'public relations' through the last 300 years or so, focusing on the tangible and intangible impressions that dinosaurs have made on modern civilizations.

**MALA 61023 Theatre: History Alive.** It is said that in times of prosperity, when a nation is at its peak of power, that the Theatre thrives. It is also understood that the Theatre is a reflection of life and society. The Theatre opens an active portal to ancient civilizations and allows one to experience a world now gone. This comprehensive web-based course will explore the theatre and drama of three historical periods: Ancient Greece, Elizabethan England and 20th Century America; along with the societal influences that shaped the art form, and compare them to our contemporary world.

**MALA 61033 Dilemmas in American Politics: Freedom, Order, Equality.** The class will examine the perennial dilemmas between Freedom, Order and Equality especially as they pertain to political ideology and public policy. To understand the dilemmas, we will examine the basic structure of our government with special attention paid to the structural tensions that augment this dilemma. Next we will look at how the dilemmas surface in contemporary debate among liberals and conservatives debating a number of current issues that pit these three valued ideals

against one another to better understand the positions presented by advocates on both sides of the policy debates and to illuminate our personal positions and views.

**MALA 61043 Jerks, Nitwits, and Losers: The Anti-Hero in Western Tradition.** This class explores the changing ideas of what makes someone a jerk, nitwit, or loser from antiquity to the 20th century. How and why have these ideas changed? What cultural values - about individuality, about equality, about sympathy - do these ideas reveal? What are the social and political functions of labeling someone a jerk, nitwit, or loser? Under what conditions are these anti-heroes admirable, even heroic? Readings will possibly include: Homer's "The Iliad" (selections), Pautus's "Miles Gloriosus", Chaucer's "Canterbury Tales" (selections), Shakespeare's "Twelfth Night", Austin's "Pride and Prejudice", Melville's "Bartleby the Scrivener", Wodehouse's "The Mating Game", and Toole's "A Confederacy of Dunces".

**MALA 61053 Parapsychology: Weighing the Evidence.** The field of parapsychology includes phenomenon such as telepathy, clairvoyance, psychokinesis, ghosts and hauntings, spirit communication, and near-death experiences. The claim by many parapsychologists is that these paranormal occurrences have been studied with rigorous research methods, and that there is considerable evidence to support their existence. This course will weigh the evidence for parapsychology by tracing the history of psychical research from the dawn of spiritualism to the present day use of the ganzfeld technique. We will discuss the careers of famous psychics as well as the contributions of many noted parapsychologists. The methods and results from parapsychological studies will be evaluated in the context of the approaches used by researchers in the natural sciences. This course will address the following important issues: are testimonials useful evidence to support the existence of these phenomena; do fraudulent claims preclude acceptance of the field; can parapsychological research findings be replicated; do probability and chance help explain paranormal events; how have magicians and skeptics affected the perception of parapsychology in the scientific community and the general public. The objective of this course is to present perspectives from both "believers" and "skeptics" such that in the end, each student can make up his/her own mind as to the strength of the evidence.

**MALA 61063 Light, Color, and Space.** Human beings receive over 80% of their information about the spatial environment through vision. The mechanism by which this visual environment is revealed to us is light. It is the quality of that light, in all of its manifestations, that has inspired mankind for thousands of years. Ranging from the philosophical statement "I see," which has more to do with the act of understanding than the process of seeing, to the psychological aspects of certain three dimensional visual illusions that work, based solely upon stored mental information on the location of our sun and the resultant cast shadows; light has both inspired and guided our relationships with the world that surrounds us. So strongly interwoven is this relationship that it passes for the commonplace. This course seeks to explore and clarify the inter-relationship between man and light. Students will combine the advantages of distance education and concentrated exploration in the TCU Center for Lighting Education to create a unique learning environment. Individual/team investigations will concentrate on the use of light and color to create sophisticated themed environments. The TCU Center for Lighting Education will be used to support the actual demonstration of and investigations into the use of various types of electric lighting devices, ranging from simple track fixtures to computer controlled fixtures that can change color, lighting position, and pattern. The course will be further enhanced by two Lighting Designers in Residence who each provide a week long interactive lighting/learning experience.

**MALA 61073 The Supreme Court's Greatest Hits.** Civil Rights & Liberties: From Fundamental Freedoms to Prayers at Football Games.

**MALA 61083 The Wild West.** Well...was it? When? To whom? What tamed it? This course will wrestle these questions by surveying the history of the trans-Mississippi West from contact to the present (possibly into the future) and considering the significance, or insignificance, of frontiers in American History. Students will read a textbook and analyze the West through extensive use of web sites and representations in popular culture, especially films.

**MALA 61093 Profiles in Courage: Cinematic Studies of Greatness.** Profiles of Courage: Cinematic Studies of Greatness.

**MALA 61103 Psychology of Sex, Violence and Aggression.** Teaches students how to think critically about psychological research on sex, violence, and aggression. The course goal is to educate intelligent consumers of media information and misinformation, teaching them to separate scientifically valid from invalid claims that such factors as genetics, biochemistry, socialization practices, sex differences, ambient temperature, alcohol, television, movies, and video games affect interpersonal violence and aggression.

**MALA 61113 American Stage: History of American Theatre.** The United States has a rich theatrical and dramatic heritage often hidden in the shadow of our colonial connection to England and dismissed by the Puritan ideology and ethics that formed the basis of our government. This web-based course shall explore that rich heritage through an in-depth look at the people, historical situations and the drama literature that reflected the growth of this country from our colonial beginning to it's maturity as a world leader in the 20th century.

**MALA 61123 Global Persuasive Campaigns, Their Influence and Impact.** An examination of the influence and impact of global persuasive campaigns through an analysis of the structure of the campaign process and the use of images to create familiarity and experience. Global communications have created an international community exposed to persuasive campaigns, some advertising and some informational. The influence and impact of these campaigns varies with the different media in which they appear and as they are interpreted in the context of different cultures.

**MALA 61133 Aspects and Issues: Health Care Delivery.** The course examines the various aspects of health care delivery in the United States and other countries. The course will provide the student with a critical analysis and overview of health care delivery focusing on factors impacting it's access, quality and cost.

**MALA 61153 Texas Political Leadership.** During the 20th Century, Texas provided a large share of national leadership in the United States and had some groundbreaking participants in the political change of that century. In this class, we will examine ten of those political figures, including the four chamber leaders of the House from Texas

(Speakers Garner, Rayburn, and Wright and Majority Leader Arme), Lyndon Johnson as Senate majority leader, and the three presidents from Texas (Johnson, Bush, and Bush). We will also examine the career of John Tower as founder of the modern Republican party in Texas, Barbara Jordan as a groundbreaking public servant, and John Connally as one of the most powerful leaders in the state. The focus will be on techniques of political leadership and how they changed over the course of the Twentieth Century.

**MALA 61163 American Minority Theatre.** An overview of American Minority Theater focusing on African-American and Women's Theater from the late nineteenth century to the present. Readings and discussions will cover the roots of each genre, the influential plays and playwrights, the companies who presented the works and the response from the audiences and critics. The student will also participate in field experiences and interviews with theater professionals. Field experiences and interviews may include: attending an African-American church service, attending a theater production about the African-American experience or the Female experience, attending a lecture in an African-American Studies or a Women's Studies class on a nearby campus, a personal interview with an African-American and a Woman involved in professional theater (this can be done in person or through mail correspondence) or any experience agreed upon by the student and the professor that focus on the African-American and Female experience.

**MALA 61173 Troubled Neighbors: US and Latin America.** This course focuses on the imbalance of power that has existed historically between the United States and Latin America and the hemispheric problems that have resulted from that imbalance. From the Monroe Doctrine in 1823 to the military intervention in Haiti in 1994, the United States has asserted a leadership role in the hemisphere, often with little understanding of the impact its actions had on the less-powerful nations of Latin America. Most of the course is devoted to the 20th Century, and major issues are examined from both the U.S. and Latin American perspectives.

**MALA 61183 Red, White and Green: U.S. Environmental History.** Red, White, and Green: United States Environmental History. This course will examine events from the perspective of the complex relationships between humans and their environment from pre-literate times through the 21st century. Geographically, the course will be bounded by the limits of the present United States. During the term, we will address the following questions: How did the environment shape American history and influence various American societies? How have conceptions of the environment changed? Do humans interact with the environment any differently now than they did 600 years ago? Do some groups have better ways of interacting with the environment than others?

**MALA 61193 Health Care and the Quality of Life.** The course will examine the state of health care in the United States and explore how quality is defined in light of it. A brief overview of the structure and processes of health care delivery will be presented followed by a review of the various methods for defining and establishing quality in health care in our society. The role and influence of health care providers (medical and insurance companies) on individual choices will also be examined. Specific issues facing society related to health care decision-making will be reviewed and then related to how and who interprets the concept quality.

**MALA 61203 Romantic Attractions and Close Relationships.** Teaches students how to think critically about psychological research on romantic attraction and close relationships. The course goal is to educate intelligent consumers of media information and misinformation, teaching them to separate scientifically valid from invalid claims about the causes and consequences of initial romantic attraction, deepening close relationships, sex differences, problems that occur within close relationships, and effective versus ineffective strategies for resolving conflicts in close relationships.

**MALA 61263 The US Economy: Analysis and Outlook.** The impact of economic policy will be examined from several different theoretical perspectives. Students will be exposed to different types of economic analysis, and will also use a computer simulation model to analyze the impact of selected policy changes. The use of the model requires no prior computer experience.

**MALA 61283 A World of Weather: Fundamentals of Meteorology.** A non-mathematical treatment of the principles of meteorology and climatology. The objectives of the course are: 1. to develop a working understanding of general meteorological and climatological processes; 2. to develop an understanding of the spatial and temporal variability of these processes; and 3. to understand how these factors influence the climate of a region. The energy system is discussed first, followed by an examination of simple dynamic relationships, synoptic circulation, global climate and climate change.

**MALA 61323 The New South, 1877 - Present.** In this course the political, social and economic factors in the New South are examined with attention given to comparative regional history. Particular emphasis will be placed on historical interpretations, showing both the professional and lay image of the South in today's society. The economic modernization of the South will also be a major theme of the course.

**MALA 61373 The Social Psychology of Crime and Victimization.** This course introduces students to the central ideas in the field of social psychology and the significance of these ideas in providing explanations for criminal behavior and related phenomena. Additionally, classic social psychological theory and research are examined and utilized to understand offenders, victims and criminogenic environments. The course emphasizes the integration and application of course content to understand contemporary criminological issues such as the use of the death penalty for juveniles, treatment and control of sex offenders, criminalizing drug offenders, and the validity of repressed memory.

**MALA 61423 Modern Mexico: A Nation in Crisis.** The emergence of Mexico from colonial status to hemispheric leader and major force among "third-world" countries. Considerable attention is devoted to the Revolution of 1910 and the ongoing revolutionary process it initiated. The role of the United States in the emergence of modern Mexico is discussed in detail. The course concludes with an extensive examination of Mexico's role as a major oil producer and the current financial and economic crisis with which the country is contending.

**MALA 61523 The Importance of Plants in Our World.** An investigation into the aspects of plants that make them useful to people from an economic and social perspective. The structure, chemistry, genetics and ecology of plants will be examined. Products derived from flowers, seeds, fruits, stems, leaves and roots are analyzed in light of past, present and future needs of the world community.

**MALA 61533 American Revolution: A Blessing or a Curse.** Today's headlines report the failure of revolutions with their civil wars, ethnic massacres, and palace coups. What constitutes a successful revolution? What lessons are there in the American experience? General Washington's startling words in 1783 express his anxiety for the problems of American statebuilding and give the title to a course that will examine the origins of those problems in the protest to British imperialism, the War for Independence, and the post-war challenges leading to the creation of the federal structure under the Constitution.

**MALA 70733 Science, Scientists and Society.** This course explores the workings of science and scientists by studying recurring themes and selected episodes of scientific change and the social and intellectual milieu in which they occurred. The focus is on the interaction between science and society from the Renaissance through the Enlightenment and the Victorian Era and into the Modern Age. How science differs from or is similar to other areas of human endeavor such as art, religion, philosophy, or politics are examined. Related topics range from man's and God's place in the universe to sociobiology, sexism, and evolutionary ethics.

**MALA 70813 The Cold War at Home and Abroad.** Between 1945 and the collapse of the Soviet Union, the Cold War has dominated American national life and foreign policy, resulting in trillions of dollars in defense expenditures, two full-scale wars, in Korea and Viet Nam, and several smaller-scale military expeditions. This course involves reading and discussion of the origins of the Cold War, key events in the history of the conflict and the consequences of the Cold War for American society and the world.

**MALA 71843 The Ethics of Communication.** An examination of contrasting models and standards of communication ethics. Students apply these perspectives to specific situations in politics, advertising, interpersonal communication and writing.

#### **Traditional Courses**

**MALA 60033 Outbreak: Infectious Diseases and World History.** A broad, integrated view of infectious disease in humans within the context of society and history. Development of medical science and technology, effects of disease in society, and conduct and limitations of historical inquiry will be examined.

**MALA 60043 Mass Media and Society.** A critical analysis and overview of the mass media in its cultural context provides an understanding of mass communication and society with an emphasis on processes and effects of media technology, on media as agents of power and on media and the consumer in a global community.

**MALA 60053 The Asian Enigma: Modern China and Japan.** An analysis of the civilization, culture and values of contemporary China and Japan with a view to explaining why each nation reacted so differently to Western impact and what each portends for America and the rest of the western world. The course stresses traditional Chinese and Japanese values, how they are manifested in everyday life as well as national and economic decision-making, and how these values are different from those held by most Americans.

**MALA 60063 Literature of the American Southwest.** The course will investigate the idea of a "sense of place" by working toward a definition of the "American Southwest." We will examine how authors evoke a distinctive sense of place by reading and discussing nonfiction books of travel (e.g., John Graves' *Goodbye to a River* or Richard Shelton's *Going Back to Bisbee*) and a range of fictional works representing several literary modes, ethnicities, and Southwestern perspectives.

**MALA 60073 The Impact of Computers on Society.** This is a non-technical introduction to what a computer is, how it functions, and how they are used in today's society. In addition to learning about the impact of computers, students will learn to use a browser to access the Internet.

**MALA 60083 The African Presence in Latin America.** Using contemporary literature as a point of departure, this interdisciplinary course will examine the African influence in Latin America. The course will explore the history and culture of Latin Americans of African heritage including their role in the work force, the struggle for independence and freedom, and the preservation of their culture. It will also include an analysis of Afro-Latin American contributions to music, dance, visual arts, cuisine, language, and religious expression.

**MALA 60103 Working Class Life in Literature and Film.** An examination of working-class life and culture traditionally ignored by the academy. By examining fiction, poetry, and films by and about the working-class, we will seek to understand the fluidity of working-class life and culture as well as the way social class intersects such other identities as race, gender, and sexual orientation.

**MALA 60113 Myths and Legends: North American Indian Thought.** A survey of the legends and myths and the cultural-agricultural practices of the north American Indian tribes and nations with a focus on the nature of the self (person; tribe), the world (nature; cosmos), and their interrelationship(s). Luther Standing Bear declares, "The Indian, by the very sense of duty, should become his own historian, giving his account of the race - fairer and fewer accounts of the wars and more of statecraft, legends, languages, oratory, and philosophical concepts." These concepts are discussed and comparisons with Western philosophy are made when appropriate.

**MALA 60123 Global Persuasive Campaigns, Their Influence and Impact.** An examination of the influence and impact of global persuasive campaigns through an analysis of the structure of the campaign process and the use of images to create familiarity and experience. Global communications have created an international community exposed to persuasive campaigns, some advertising and some informational. The influence and impact of these campaigns varies with the different media in which they appear and as they are interpreted in the context of different cultures.

**MALA 60133 The Sociology of Deviant Behavior.** This course examines deviance as a social phenomenon. The goal is to introduce students to substantive topics and scholarly work within the sociology of deviance while providing an opportunity for discussion and critique. Special emphasis will be placed on the interactional dynamics involved in defining and managing deviance and the development of deviant careers.

**MALA 60143 Economics of Contemporary Issues.** Basic concepts and tools used by economists and



applications of those tools to the analysis of contemporary economic and social issues. Included among the issues to be examined will be drug prohibition, tax reform, Social Security, the minimum wage, and environmental protection.

**MALA 60153 Culture and American Cinema.** An exploration of cinema as a form of American social expression. As cultural artifacts, films are produced in specific historical contexts by and for cultural groups. Films produced for American audience reflect American values, myths, and behavior and thus constitute an important form of social expression. After examining the cultural roots of American cinema, social/cultural events in American cultural history such as the Great Depression, World War II, Vietnam, the '60s, the inner-city struggle, the Civil Rights movement, the Reagan conservatism, and the films of the '90s will be investigated.

**MALA 60173 Religious Art and Architecture in Italy.** Study in Rome and Florence of the artistic achievements of Western culture, emphasizing the historical perspective of the development of Christianity and Western civilization.

**MALA 60183 After Dictatorship: Can Latin American Nations Achieve Democracy?.** The course challenges the facile assumption that because guerrilla wars have ended and the generals have turned power over to civilians, Latin America will necessarily "go democratic." The course focuses on the peace processes in selected Latin American countries in order to explore the serious challenges that confront nations seeking to democratize when they are saddled with deep legacies of authoritarianism.

**MALA 60193 High Civilizations of the Americas: The Aztecs, the Incas, and the Maya.** An examination of the beginning, development, and decline of the three major aboriginal cultures of the Western Hemisphere. The total culture of each civilization will be explored including religious, social, economic, and military factors. Post-conquest developments will also be examined.

**MALA 60213 Contemporary Indigenous Literature of Mexico.** A study of literary works by outstanding, contemporary writers hailing from a variety of Mexican indigenous ("Indian") ethnic groups: Nahuatl, Zapoteco, Yucatec Mayan, Mazateco, Tzeltal, among others. The pre-Hispanic roots of this new literature will be examined, as will recurring themes and other ancient motifs which persist in today's writers. Short stories, poetry, and drama will be studied within their specific framework. Recent English translations by Dr. Frischmann and his personal research experiences will make this course accessible to all MLA students.

**MALA 60223 The Watergate Legacy.** The purpose of this course is to revisit the Watergate episode in American politics. We will begin by examining the events as they happened, focusing on key decision and key moments that determined the outcome of Watergate. In the first part of the course, we will watch a documentary summarizing the people and events that occurred. In the second part of the course, we will examine the political reforms that came out of the Watergate period and their impacts on current American politics, including the Clinton impeachment hearings. Included in this section will be discussions of election reforms, executive privilege, congressional-presidential relations, and the special prosecutor's role in the impeachment process. Third, we will examine the new environment in presidential-media relations fostered by Watergate, including a critical viewing of the movie *All the President's Men*. Finally, we will attempt to assess Richard Nixon as a political leader in the mid-twentieth century.

**MALA 60243 Current Issues in Economics: the Financial Markets.** The basic structure of the American economy as it relates to the financial markets will be examined. Time will be spent on financial market history in order to gain perspective on current market conditions. The problem of inflation will be the point of departure for this historic segment. Technical analysis of current and past markets will also be given some consideration.

**MALA 60253 King Arthur Meets Queen Victoria: Arthurian Literature in the Victorian Age.** An examination of the roots of current American interest in Arthurian legend in Queen Victoria reign. Students will read important literary works, including Alfred Lord Tennyson's *Idylls of the King*, William Morris's "Defense of Guenevere," and Mark Twain, *A Connecticut Yankee in King Arthur's Court*, and explore the historical and political conditions surrounding the 19th-century medieval revival. The course concludes with a screening of *Excalibur* (1981) and discussion of its indebtedness to the Victorian era.

**MALA 60263 The US Economy: Analysis and Outlook.** The impact of economic policy will be examined from several different theoretical perspectives. Students will be exposed to different types of economic analysis, and will also use a computer simulation model to analyze the impact of selected policy changes. The use of the model requires no prior computer experience.

**MALA 60273 Economic Policy and Its Impact: A Simulation Approach.** Computer simulation models will be used to learn important economic concepts and to analyze current economic problems. Students will assume the role of economic policymakers and as such will initiate policy changes and examine their effects on various aspects of the economy, such as the national output level, the inflation rate, the unemployment rate, and the distribution of income. No prior computer experience is necessary.

**MALA 60283 A World of Weather: Fundamentals of Meteorology.** A non-mathematical treatment of the principles of meteorology and climatology. The objectives of the course are: 1. to develop a working understanding of general meteorological and climatological processes; 2. to develop an understanding of the spatial and temporal variability of these processes; and 3. to understand how these factors influence the climate of a region. The energy system is discussed first, followed by an examination of simple dynamic relationships, synoptic circulation, global climate and climate change.

**MALA 60293 Matisse, Picasso and the Triumph of Modern Art.** An exploration of the contributions of Henri Matisse and Pablo Picasso to the establishment of 20th-century modern art. The course examines works of art by the two in detail, the contexts in which their work was created, and the impact their art had on modern culture. This course is offered in conjunction with a special exhibition at the Kimbell Art Museum, where the class will meet several times.

**MALA 60313 A New American Foreign Policy?.** This course examines a wide array of issues confronting U.S. foreign policy makers in the post-Cold War period. On the domestic side, it deals with selected issues regarding how

U.S. foreign policy is made. Internationally, it examines contemporary foreign policy problems and the options seemingly open to policy makers. These problems could revolve around specific issues (like the promotion of democracy, trade, terrorism, etc.) or particular countries (like Russia, China, Mexico, Cuba, etc.)

**MALA 60323 The New South, 1877 - Present.** In this course the political, social and economic factors in the New South are examined with attention given to comparative regional history. Particular emphasis will be placed on historical interpretations, showing both the professional and lay image of the South in today's society. The economic modernization of the South will also be a major theme of the course.

**MALA 60373 The Social Psychology of Crime and Victimization.** This course introduces students to the central ideas in the field of social psychology and the significance of these ideas in providing explanations for criminal behavior and related phenomena. Additionally, classic social psychological theory and research are examined and utilized to understand offenders, victims and criminogenic environments. The course emphasizes the integration and application of course content to understand contemporary criminological issues such as the use of the death penalty for juveniles, treatment and control of sex offenders, criminalizing drug offenders, and the validity of repressed memory.

**MALA 60383 States of Consciousness.** An examination, from psychological and physiological perspectives, of various states of human consciousness including wakefulness, deep sleep, hypnosis, meditation and drug-induced states. The relationship between consciousness and our scientific and group consciousness (based on social validation of experience) and individual consciousness (based on our unique perceptions of reality). It offers a balanced perspective on consciousness that combines scientific information, Eastern philosophy, and experiential data.

**MALA 60403 Global Geopolitics.** In a world subject to war, ethnic conflict, and economic disruption, to what extent does geography explain the unfolding of global events? How do access to waterways, the level of economic development, the blessings of natural defenses, and proximity to other nations determine the stance a country presents to the outside world? Geographer Dr. Jeffrey Roet will introduce geopolitical concepts that help explain conflict and change and show how geography is indeed the stage upon which history is set. He will reveal centuries-old patterns behind the dynamics of war, economic competition, and other current global concerns.

**MALA 60423 Modern Mexico: A Nation in Crisis.** The emergence of Mexico from colonial status to hemispheric leader and major force among "third-world" countries. Considerable attention is devoted to the Revolution of 1910 and the ongoing revolutionary process it initiated. The role of the United States in the emergence of modern Mexico is discussed in detail. The course concludes with an extensive examination of Mexico's role as a major oil producer and the current financial and economic crisis with which the country is contending.

**MALA 60443 Contemporary Issues in Human Health.** From the human genome project and cloning to hormone replacement therapy and antibiotic resistance, new issues involving human health as science discovers more about the causes and treatment of human diseases increasingly confront us. Our ability to manage our health depends on our understanding and appreciation of the biological concepts underlying these issues. This course will examine some of these contemporary issues and the underlying biological concepts through readings from a variety of Web resources.

**MALA 60453 The Former Soviet Union: An Historical Analysis.** An examination of the major personalities, institutional developments, foreign policy, literature, and general historical trends in the former Soviet Union. Emphasis is given to the evolution of both the Communist Party and the Soviet government and the personalities instrumental in formulating Soviet ideology and institutions - Lenin, Stalin, Khrushchev, and others - as well as the post-Soviet period and the prospects for Russia's future.

**MALA 60463 God and Nature.** The encounter of Christianity and science. Attention is given both to the historical foundations of the discussion and to contemporary attempts to understand the relationship between these two areas of human life.

**MALA 60473 Life During Wartime: English Society and Culture, 1900 - 1945.** This course will examine the social and psychological effects of living through and in the shadow of war for a prolonged period. The focus will be on British writing of the first half of this century (novels, poetry, memoirs) as well as more recent attempts to reflect back on that period from the (relative) tranquility of the 1980s and '90s. We will also consider why there has been such a fascination with wars at the end of this century.

**MALA 60483 How the Civil War Was Lost: Problems in the Confederate High Command.** This course examines the issues and problems involved within the Confederate government in selecting and using generals and in developing and implementing national strategy during the Civil War. Topics include the personal role of Jefferson Davis, the influence of Robert E. Lee, the problematic service of Braxton Bragg, P.G.T. Beauregard, and Joseph E. Johnston, among others. We will also explore the controversies among Confederate leaders between offensive and defensive strategy and between Virginia the western theater of the war.

**MALA 60513 Cowboy Philosophy: Character, Vice and Virtue in the Western.** This course examines the morality practiced in Westerns in terms of recent philosophical work on character, vices and virtues. By "Western" is meant primarily films, but the genre is expanded to include novels, cowboy poetry and songs, and rodeos.

**MALA 60523 The Importance of Plants in Our World.** An investigation into the aspects of plants that make them useful to people from an economic and social perspective. The structure, chemistry, genetics and ecology of plants will be examined. Products derived from flowers, seeds, fruits, stems, leaves and roots are analyzed in light of past, present and future needs of the world community.

**MALA 60533 American Revolution: A Blessing or a Curse.** Today's headlines report the failure of revolutions with their civil wars, ethnic massacres, and palace coups. What constitutes a successful revolution? What lessons are there in the American experience? General Washington's startling words in 1783 express his anxiety for the problems of American statebuilding and give the title to a course that will examine the origins of those problems in the protest to British imperialism, the War for Independence, and the post-war challenges leading to the creation of

the federal structure under the Constitution.

**MALA 60543 Civil War: Tullahoma and Chickamauga Campaigns.** This course will present an in-depth study of the crucial phase of the Civil War in the second half of 1863 during which both sides struggled for control of the central theater of the war in Middle and East Tennessee and in northern Georgia. It will also touch on the social, cultural, and political context of the war.

**MALA 60553 Dilemmas in American Politics: Freedom, Order, Equality.** The class will examine the perennial dilemmas between Freedom, Order and Equality especially as they pertain to political ideology and public policy. To understand the dilemmas, we will examine the basic structure of our government with special attention paid to the structural tensions that augment this dilemma. Next we will look at how the dilemmas surface in contemporary debate among liberals and conservatives debating a number of current issues that pit these three valued ideals against one another to better understand the positions presented by advocates on both sides of the policy debates and to illuminate our personal positions and views.

**MALA 60573 Aesthetics of Film, TV, Radio Production.** The course provides a behind-the-scenes look at film, television, and radio, guiding students to a thorough understanding of the technological and stylistic options available to producers and directors. These options, in turn, form the palate from which directors and others construct mediated texts--the images, sounds, and dramatic tensions necessary for the successful execution of theatrical film, television, and radio. Examples will be taken from current film, television, and radio programming. Aimed at an educated consumer of the media, this course requires no previous experience in the media arts.

**MALA 60593 Light, Color, and Space.** Human beings receive over 80% of their information about the spatial environment through vision. The mechanism by which this visual environment is revealed to us is light. It is the quality of that light, in all of its manifestations, that has inspired mankind for thousands of years. Ranging from the philosophical statement "I see," which has more to do with the act of understanding than the process of seeing, to the psychological aspects of certain three dimensional visual illusions that work, based solely upon stored mental information on the location of our sun and the resultant cast shadows; light has both inspired and guided our relationships with the world that surrounds us. So strongly interwoven is this relationship that it passes for the commonplace. This course seeks to explore and clarify the inter-relationship between man and light. Students will combine the advantages of distance education and concentrated exploration in the TCU Center for Lighting Education to create a unique learning environment. Individual/team investigations will concentrate on the use of light and color to create sophisticated themed environments. The TCU Center for Lighting Education will be used to support the actual demonstration of and investigations into the use of various types of electric lighting devices, ranging from simple track fixtures to computer controlled fixtures that can change color, lighting position, and pattern. The course will be further enhanced by two Lighting Designers in Residence who each provide a week long interactive lighting/learning experience.

**MALA 60613 Literature and Film: The Art of Adaptation.** Time and again filmmakers turn to literature for inspiration; we have become accustomed to seeing favorite works of literature "translated" for the screen. This course will ask you to move past the initial reaction--Is the film better than the book, or vice versa?--to analyze the methods used in adaptation. How does each medium establish characters, develop mood and atmosphere, communicate emotions and thoughts? Furthermore, the course will examine how adaptations have been influenced by factors such as changing cultural attitudes and censorship.

**MALA 60633 The Role of Capital in Domestic and International Economy.** One of the least understood features of our economy is the nature of capital (physical and financial). Yet it plays a vital role in creating present employment and future productive capacity, and it grabs headlines through stock market fluctuations and international financial crises. This course both arms the student to differentiate among the confusing variety of uses of the term capital and explains what it can and cannot do in terms of world and domestic economic growth, social security financing, federal debt financing, and third world development.

**MALA 60653 The People's Choice: American Presidents.** A history of the issues, conflicts and personalities in the development of the American presidency. An examination of twelve selected presidential administrations from George Washington to the modern presidency will be conducted.

**MALA 60693 The Satiric Vision: From Jonah to Doonesbury.** Study of the literary art of satire, including forms of satire, angles of satiric vision and examination of chief satirists' works and techniques.

**MALA 60703 Columbus: Global Encounter.** Columbus' first voyage opened a period of dramatic encounters between European, Amerindian, African and Asian peoples. These cultural interactions also brought an exchange of other living organisms (plants, animals and bacteria), of products such as minerals, and of knowledge about the world that irrevocably altered human life. This course examines the Columbus voyages and the encounters and exchanges that followed.

**MALA 60713 The History of War.** In this survey we will seek to understand the influence of war in human history from ancient times to the present. This course will trace the causes and effects of war, the evolution of military technology, and the role played by leadership. To highlight these, we will discuss decisive military battles throughout history. Hopefully, by examining this process we will be able to understand ourselves and our world a little better.

**MALA 60723 Decisive Speeches in American History.** The mind of America has been expressed in many ways through the rhetoric of the past two centuries. America has come of age, in part at least, through the efforts of men and women who have used persuasive words to direct the course of events. The course will be a study of the ideas and forms represented by the rhetorical works of approximately forty men and women who have played an active part in shaping the destiny of the American nation by persuasive means. The specific efforts of each speaker are placed in historical perspective.

**MALA 60733 Creativity and the Human Experience.** All of the human enterprises, including science, literature, art, and music, pour forth from the wellspring of human creativity. Society rewards outstanding instances of creativity with prizes ranging from the Pulitzer, to the Van Cliburn, to the Nobel. Yet creative persons of less dramatic achievements can be rewarded just the same with fruitful and fulfilling lives. But what is creativity? How

can we identify it? How can we foster it? How did it emerge in homo sapiens? How can each of us lead more creative lives? This course will seek to answer these questions.

**MALA 60773 Images of Jesus in Faith and Culture.** Jesus of Nazareth, by any account, is one of the most significant figures in human history. Yet the person, role, and images associated with Jesus have been understood in an enormous variety of ways, both within the Christian tradition and outside it. This course introduces the student, in a descriptive manner, to the spectrum of views of Jesus' person and work found in the Bible, in extra-canonical Christian literature such as the Gospel of Thomas and recently rediscovered Gnostic writings, in the various streams of Christian history, and in secular culture. The primary focus is on the meaning of the interpretations of Jesus, but some attention will be given to the methods scholars use in assessing these interpretations and in reconstructing the "historical" Jesus, as well as portrayals of Jesus in painting, novel, and film.

**MALA 60803 Pax Americana: United States Foreign Relations in the Twentieth Century.** Now that the Cold War is over and the 20th century is coming to a close, how well did the United States fulfill its destiny of making the past hundred years the "American Century" that so many Americans predicted in the 1890s? This course offers some perspectives as answers by tracing the development of a global American foreign policy from the period following the Spanish-American War until the end of the Cold War. It also examines the forces - both foreign and domestic - that influenced those policies as the United States tried to formulate new diplomacies to meet each of the ever changing challenges in world affairs of this most dynamic century.

**MALA 60813 Recent American-Jewish Fiction.** This course will examine the distinctive contributions to recent American fiction made by American-Jewish fictionists. The course focuses on similarities and differences between concerns and visions of such authors as Elie Wiesel, Bernard Malamud, Philip Roth, Isaac B. Singer and Saul Bellow.

**MALA 60903 British Humor from the Goons to the Young Ones.** A look at British Humor on radio, TV, and film and the attempts to define its unique attributes. The faculty of sensing the laughable and absurd is a universal trait, but its mode of expression varies by cultural differences and in accordance with values of class, education, or special interest. "British humor" as exemplified in popular culture by Monty Python's Flying Circus has gained recent acceptance in U.S., but it actually is based on a long tradition that has its roots in the special love of wit, puns, paradoxes, and epigrams the English have manifested since the Viking invasions.

**MALA 60943 Philosophy in the Twentieth Century: On Life and Living.** William James' reflections on life and living 1895/1899 prompt the central question, what are the conditions to lead the life of a person? The question is addressed by the following literature: Robert Nozick, *The Examined Life: Philosophical Meditations* 1989, John Kekes, *The Examined Life* 1992, and Richard Wollheim, *The Thread of Life* 1984.

**MALA 60953 Modern Astronomy: From the Origin of the Universe to Black Holes.** An introduction to selected topics on recent developments in astronomy and astrophysics: the birth, life and death of stars; black holes, pulsars, supernovae, comets, and quasars; the origin of galaxies; worlds of the solar system; and the Big Bang and the evolution of the cosmos. Questions to be pondered include: How old is the universe? Where is the missing mass? Are we alone? How and when will the universe end? Recent discoveries by the Hubble Space Telescope and other missions are also discussed.

**MALA 60963 Disappearing God.** The religious dimensions of modern literature are explored in terms of how various authors treat the reality of God. The novels chosen are examined through a study of their principle traits, such as elements of religious myth and fantasy, motifs of criminality, quests for new orders of meaning and new forms of community, and the recurrence of urban life as a metaphor for modern spiritual experience. These traits are analyzed as various means that authors use to test religious values or to suggest alternative secular visions of the world.

**MALA 60970 Special Problems.** Special problems in Liberal Arts.

**MALA 61523 Importance of Plants in Our World.** An investigation into the aspects of plants that make them useful to people from an economic and social perspective. The structure, chemistry, genetics and ecology of plants will be examined. Products derived from flowers, seeds, fruits, stems, leaves and roots are analyzed in light of past, present and future needs of the world community.

**MALA 70013 Men, Women and Society: A New Definition of Roles.** An examination of new ideas, data and theories to interpret changing roles of men and women in contemporary society.

**MALA 70023 Expressions of Religious and Cultural Values in the Arts.** An analysis of the visual arts, architecture, and music as expressions of religious and cultural values. Development of these art forms in Western culture as well as the formation and roles of symbols and iconic forms of communication are investigated.

**MALA 70073 Energy Resources, Alternatives, and Environmental Issues.** A study of the distribution of the world's energy resources and a look at alternative sources of energy such as wind, tides, geothermal, synfuels, solar and nuclear power. Environmental issues including air and water pollution, solid waste, pesticides, toxic substances, etc., will be addressed as will new techniques for finding and evaluating earth resources utilizing satellite data and the internet.

**MALA 70083 The British Comic Novel.** This course examines the comic tradition in the British novel from the 18th century to the present. It uses representative major works of narrative prose fiction to illustrate various types and techniques of comedy. Another purpose is to study the nature of the novel and its role in the history of British literature.

**MALA 70113 Native Peoples of the American Southwest.** An overview of the native Americans of the region from pre-contact times to the present. Relations and differences among native groups are emphasized as well as interactions with non-Indian groups. Efforts to "whiten" the native population ranging from Spanish missionary activities in the 16th century to the federal government's "termination policy" in the 1950s are analyzed.

**MALA 70173 American English: Past, Present and Future.** A study of the English language in America from colonial times to the present. Within this historical framework, numerous contemporary questions are addressed:

Where do our different dialects come from? How is our language changing? Is linguistic change good or bad? What does the future hold? Students are given the opportunity to investigate current language controversies.

**MALA 70183 Mass Media and Perceptions of Reality.** The complexity of our society makes it necessary for us to draw what we know, or think we know, from information about events, trends, and even people from the mass media. Yet few people are trained as consumers of information produced by the media. This course examines the various perceptions of reality that the mass media create, exploring some of the reasons why these perceptions occur.

**MALA 70213 Understanding Behavior: A Look at Four Cultures.** An introduction to the concepts and methods of ethnography. This theoretical approach will be made practical through the study of four culture areas: sub-Saharan Africa, lowland South America, highland South America, and North America. Consequently, four different types of society will be studied: hunting and gathering, horticultural, agricultural and industrial.

**MALA 70233 Rise of American Business.** The evolution of the American business system is examined with emphasis on four basic themes: the impact of technological and managerial change, the interaction between business and society, the position of the businessman and businesswoman in society, and the constantly-changing relationships between business and government. Special attention is devoted to the contemporary business scene.

**MALA 70253 War To Peace: Political Change in Cuba and Central America in the 1990s.** An examination of the dramatic but low profile political transition taking place in countries that only recently were torn by revolution and by counterinsurgency wars. The original causes of those revolutions, including the Cold War ideological divisions that formed the international environment in which they took place will be discussed. We will examine the tentative, fragile steps that are presently being taken to overcome the authoritarian and violent political legacies of the past and to build a more inclusive, democratic political future.

**MALA 70273 Psychoanalytic Perspectives on Society.** Over the last thirty years of his life Sigmund Freud went beyond his clinical concerns and constructed social theories. During this period, Freud produced a series of works analyzing human societies and such social phenomena as religion, the family, social groups, and social change. This course presents Freud's social thought as reflected in these later writings, assessing both his contributions and limitations as a social thinker.

**MALA 70373 Modern American Society: Global Power since World War II.** This "period" course in American history reviews major political, economic, social, cultural and diplomatic events: World War II, the Truman administration and post-war America, the Eisenhower administration and the consensus of the 1950s, the Kennedy administration, Lyndon Johnson and the Great Society, the civil rights movement, the Republican ascendancy, and the rise of southern power.

**MALA 70443 William Faulkner: Storyteller of the South.** An examination of five major novels from the Yoknapatawpha cycle: *Light in August* (1932), *Sanctuary* (1931), *The Sound and the Fury* (1929), *Absalom, Absalom!* (1936) and *Go Down, Moses* (1942). The course focuses on the art of Faulkner's fiction as well as upon his ideas, themes, characters, and meanings.

**MALA 70533 Civil War and Righteous Reformers: Conflict in Stuart England.** This course introduces 17th century English ideas of politics and religion and how their clash brought the British monarchy to a state of collapse in 1649. It analyzes how the English Civil War (1642-49) and the Interregnum (1649-60) altered the power between the Parliament and the Crown. This produced the balance of the modern British Constitution and its government. This course concludes with an examination of the cultural, social, and economic ideals of Englishmen as they were transferred to the American colonies.

**MALA 70543 Fossils and Man: The Impact of the Fossil Record.** Students will become acquainted with the impact that fossils and paleontology have had on the history of the earth. It was the fact that fossils were finally accepted as a record of ancient life that began to change the way that 17th century naturalists looked at the world. The fundamental notions of change and evolution of natural systems has forever affected man's view of the world and fossils, which, in particular, document "worlds before man." The history of interpretation of fossils in the argument for evolution, and the use of fossils in modern biology and geology will be examined.

**MALA 70553 The American Drug Experience.** An examination of the 19th century origins of widespread drug use in America, the present types of drugs and drug users, and the psychological and social aspects of contemporary drug use. Various public health models for dealing with treatment, control and prevention of drug use in the U.S. are discussed.

**MALA 70573 The Press and the Presidential Campaign.** The role the press plays in presidential campaigns and election processes; analysis of the impact of the press on public opinion, debate and consensus; the relationship between the press and politics; the press and political participation; news values and the democratic process.

**MALA 70593 Art Of The Ancient World.** Travel-study course. The content and sites visited vary according to the particular focus of the course.

**MALA 70653 The Second World War: Its Impact on the Contemporary World.** A focus on the impact of World War II as the seminal event of the 20th century that gave rise to or influenced most major contemporary global issues. By examining the war in a broader perspective, issues such as the East-West balance of power, the end of traditional imperialism, the upheavals in the third world, and the proliferation of technology, the effect of the war 50 years later can be better understood and interpreted.

**MALA 70703 American Music and Culture: From Jazz to Tin Pan Alley.** A study of the historical evolution of jazz styles in the United States from the 1890s through the contemporary scene, including American popular music Tin Pan Alley, protest music, and motion picture/television music. Included is an examination of the correlation of musical styles and cultural changes in America.

**MALA 70713 Physical Fitness as a Lifestyle.** The physiological changes that take place in the body as a result of acute and chronic exercise. Specifically, the concepts of physical fitness, conditioning programs, wellness, body

composition, nutrition, risk factor reduction and the influence of exercise on disease and aging are investigated.

**MALA 70723 Rise and Fall Positivistic Philosophy.** The development of logical positivism of empiricism from the 18th century (with George Berkeley) to the 20th century (with A.J. Ayer). (Positivism is the doctrine that all experience can be subsumed under the principles of natural science; positivism equates philosophy with science.) The major focus of the course is Ayer's infamous book, *Language, Truth and Logic* (1936) and the reactions it generated in Anglo-American and Continental philosophy. Many of these reactions are discussed in A.J. Ayer: *Memorial Essays* (1991) and C.E.M. Joad's, *A Critique of Logical Positivism* (1950).

**MALA 70763 Geopolitics and World Communications.** The study of global communications in the context of world politics. Overview of world mass media characteristics, impact of British colonialism, role of the United Nations, the New World Information Order, ownership of communication technology, issues in monopoly of knowledge, analysis of information flow and world economy and role of image-makers.

**MALA 70843 The Ethics of Communication.** An examination of contrasting models and standards of communication ethics. Students apply these perspectives to specific situations in politics, advertising, interpersonal communication and writing.

**MALA 70853 Place, Displacement, Nostalgia and Memory in Recent American Culture.** A study of recent social, historical, intellectual and geographical change through examination of social, literary, electronic discourses and through exploration of private and public change. Included is study of how, when, why, or whether marked personal and public dislocations are accompanied by diverse manifestations of nostalgia, failures, or rearrangements of private and public memory, and conflicts among competing rhetorics, with attendant apprehensiveness regarding loss of person and public values and identity.

**MALA 70863 Bioethical Issues of Modern Society.** Three main aspects of the work of a hospital ethics committee are: self-education through reading the literature in the discipline, drafting hospital policies on matters raising ethical issues, and doing case analyses. Members of the class will be formed into a committee to do all three things. Issues will include withdrawal of life-support, use of reproductive technologies including cloning, physician-assisted dying, and more ordinary topics such as informed consent and confidentiality.

**MALA 70873 Garage Sale History.** The course explores 20th century American culture through examining the ordinary objects of our lives, from A-1 Sauce to Zippo lighters, studying how, when, and why ordinary objects rise from the culture and in turn, give shape and character to both culture and personal identity.

**MALA 70903 Preparing for the Challenges of the Twenty-first Century.** The last two decades of the 20th century have ushered in tumultuous changes in the political landscape, changes that would have an indelible impact on the emerging society of the 21st century. This course is designed to provide a forum for analysis and discussion of some of the most significant issues of global politics in the post-cold war and post-modern era. While the attempt is to dissect these issues primarily on their own terms, we also discuss the challenges they pose to U.S. foreign policy as we enter the 21st century.

**MALA 70923 Islam and Politics in the Middle East.** Since there is no separation between state and church in Islam, no study of Middle Eastern politics is complete without analyzing the pervasive role of Islam in cultural and political life. The course, however, does not concentrate on Islamic theology; rather, the focus is on politics of Islam and how it molds political discourse and agenda. After the study of origins and historical development of Islamic political theory, the focus shifts to explaining the use of post-World War II Islamic revival. In this connection, the problematics of democratization in the Muslim world and the prospects for Islamic governments are discussed.

**MALA 70933 Food and Philosophy.** Philosophical examinations of moral, aesthetic, ontological, and epistemological issues concerning food are topics studied and discussed in this course. Such issues as vegetarianism; ethical issues regarding food additives, food politics and feminism; food as art; food as a metaphor of life; cultures (e.g., Mayan and Japanese) characterized by their cuisine; and recipes as a model of justified rational procedures are covered during the semester. One of the key concepts developed to handle these issues effectively is foodmaking as a thoughtful practice, where "practice" is understood by the American pragmatists, Peirce and Dewey.

**MALA 70943 Ancient Mysteries: Real and Imagined.** In addition to providing an overview of Ancient Mediterranean and Near Eastern History from the Paleolithic age to the fall of Rome, this course explores in some detail various controversial topics that have generated popular interest and often engendered misinformation. These topics are analyzed in a scholarly manner in order to solve the "mystery" or expose common mis-perceptions and pseudo-scholarship. Typical topics include the following: the fall of Rome, the historical Jesus, other Biblical topics, the pyramids, the Neanderthal problem, and the search for the Trojan War.

**MALA 70953 Mayan Ritual and Drama: Pre-Hispanic Times to the Present.** This course will examine the frequently intertwined traditions of ritual and drama among Mayan peoples of Southern Mexico and Central America, from pre-Hispanic times to the present. The course will combine a historical perspective beginning with pre-Columbian documents and Spanish colonial chronicles. Twentieth-century manifestations will be particularly highlighted, based on the instructor's first-hand research; special emphasis will be given to the work of performance groups based in Yucatan and Chiapas, Mexico. Extensive video material will complement textual analyses.

**MALA 70963 Of Virgins and Goddesses, from Mesoamerica to Modern Mexico.** The latest research and historical impact of ancient Mesoamerican female deities and their modern-day counterpart "Our Lady of Guadalupe" on contemporary culture and society in modern Mexico are examined. The course attempts to show archaeological and anthropological similarities with mythic-symbolic images of pre-history from around the world that show the importance of woman's role in all ancient cultures, including Mexico's.

**MALA 70973 Law and Society.** The examination of the relationship between legal institutions and social processes. Course readings and discussion will focus on the social and political nature of law; the creation and organization of law in modern societies; social functions of law; the limits of law as an instrument of social change; the legislation of morality; democracy, individualism and law; criminal behavior and individual rights; and the use of

scientific information in law.

**MALA 70983 Indigenous People of the Andes.** A study of the indigenous inhabitants of the Andes, especially Peru and Bolivia, through archaeological and ethnographic data. Focus is on the development of agriculture and early population centers, particularly the Incas. The course ends with a study of contemporary Quechua and Aymara peoples, and discussion of current political and economic issues.

**MALA 70993 Critical Issues in Criminal Justice.** The major controversies that exist in law and criminal justice today are discussed with emphasis on the development of critical thought concerning these issues. Both empirical evidence and grounded theory is discussed in such a manner as to help the student formulate thoughtful opinion concerning the selected topics. Topics include but are not limited to: The Death Penalty, Gun Control, The Insanity Defense, Drug Legalization, Prison Privatization, Drunk Driving Laws, Myths of Organized Crime, Crime and the Media, Fetal Endangerment Statues, and The Jury System.

**MALA 71733 Science, Scientists and Society.** This course explores the workings of science and scientists by studying recurring themes and selected episodes of scientific change and the social and intellectual milieu in which they occurred. The focus is on the interaction between science and society from the Renaissance through the Enlightenment and the Victorian Era and into the Modern Age. How science differs from or is similar to other areas of human endeavor such as art, religion, philosophy, or politics are examined. Related topics range from man's and God's place in the universe to sociobiology, sexism, and evolutionary ethics.

**MALA 71903 Preparing for the Challenges of the Twenty-first Century.** The last two decades of the 20th century have ushered in tumultuous changes in the political landscape, changes that would have an indelible impact on the emerging society of the 21st century. This course is designed to provide a forum for analysis and discussion of some of the most significant issues of global politics in the post-cold war and post-modern era. While the attempt is to dissect these issues primarily on their own terms, we also discuss the challenges they pose to U.S. foreign policy as we enter the 21st century.

**MALA 71943 Ancient Mysteries: Real and Imagined.** In addition to providing an overview of Ancient Mediterranean and Near Eastern History from the Paleolithic age to the fall of Rome, this course explores in some detail various controversial topics that have generated popular interest and often engendered misinformation. These topics are analyzed in a scholarly manner in order to solve the "mystery" or expose common mis-perceptions and pseudo-scholarship. Typical topics include the following: the fall of Rome, the historical Jesus, other Biblical topics, the pyramids, the Neanderthal problem, and the search for the Trojan War.

# Overview

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## Overview

Texas Christian University offers graduate education in more than 33 fields ranging from the highly abstract to the applied and professional. Because graduate education should be a broadening experience as well as a deepening of knowledge gained from undergraduate programs, the University offers students many options for their graduate studies. But there is a common thread running through all programs—a commitment to excellence, to the highest standards of scholarship in the disciplines and professions represented in the University.

TCU affords its graduate students many advantages: an excellent library; many outstanding research facilities and laboratories; broad-based computer services; an excellent atmosphere for learning; and, most importantly, the opportunity to study with an outstanding and dedicated faculty, many of whom are scholars of national and international reputation. In all of its graduate programs, the University seeks to foster teaching and learning of the highest quality.

## Graduate Programs

### Administration

All graduate degrees are administered by the college or school in which the academic program is offered.

AddRan College of Humanities & Social Sciences

Brite Divinity School

M. J. Neeley School of Business

School of Education

College of Communication

College of Fine Arts

College of Health and Human Sciences

College of Science and Engineering

Office of Graduate Studies and Research (Master of Liberal Arts)

The policies for graduate study are determined cooperatively by the Administration, the Graduate Council, and the Vice Chancellor for Academic Affairs. The implementation of these policies is the responsibility of the Vice Chancellor.

### Accreditations and Affiliations

Memberships and accreditations directly related to graduate study include: Southern Association of Colleges and Schools, Southern University Conference, Association of American Colleges, National Association of Schools of Music, American Chemical Society, Texas Education Agency, the International Association for Management Education, The American Speech-Language-Hearing Association, Graduate Management Admissions Council, The Association of Texas Graduate Schools, Texas Board of Nurse Examiners, and the Council of Graduate Schools in the United States.

TCU is also one of the sponsoring universities of the Oak Ridge Associated Universities located at Oak Ridge, Tennessee.

## Graduate Degrees Offered

### Master of Accounting

#### Master of Arts

Art History

Biology

Chemistry

Economics

English

History

Media Arts

Physics

Theatre (Program under review. No new applications accepted.)

### Master of Arts in Teaching

Mathematics

### Master of Business Administration

#### Master of Education

Counseling

Educational Administration

Educational Foundations

Elementary Education w/ Initial Teacher Certification --*Early Childhood-EC-4*

Elementary Education w/ Initial Teacher Certification --*Middle Grades*

Secondary Education

Secondary Education w/ Teacher Certification

Elementary Education Early Childhood 3/2

Elementary Education Middle Grades 3/2/



Secondary Education 3/2  
Special Education

### **Master of Fine Arts**

Studio Art  
--*Painting*  
--*Printmaking*  
--*Sculpture*

Ballet

Modern Dance  
--*Teacher Certification*

Theatre (Program under review. No new applications accepted.)

### **Master of Liberal Arts**

#### **Master of Music**

Conducting  
--*Band*  
--*Choral*  
--*Orchestral*

Musicology

Performance  
--*Percussion*  
--*Piano*  
--*Organ*  
--*Strings*  
--*Voice*  
--*Wind*

Pedagogy  
--*Piano*  
--*Voice*

Theory/Composition

### **Master of Music Education**

#### **Master of Science**

Advertising/Public Relations  
Biology  
Chemistry  
Environmental Science  
Geology  
Kinesiology  
Journalism  
Nursing  
Physics  
Psychology  
Speech-Language Pathology  
Speech Communication

### **Doctor of Philosophy**

Chemistry  
English  
History  
Physics  
Physics (with Business option)  
Physics (with Astrophysics option)  
Psychology

For the graduate degrees of Master of Divinity, Doctor of Ministry, and Doctor of Philosophy, offered by Brite Divinity School, the theological seminary, see the Bulletin of Brite Divinity School.

### **Special Graduate Programs**

#### ***Teacher Certification Programs***

Initial teacher certification may be pursued in conjunction with the Master's degree. Prerequisites include completion of the Bachelor's degree with an appropriate area of specialization or teaching field and submission of passing scores in all three areas of the TASP. The Mid-Management Certificate and Supervisor's Certificate are also available through the Educational Administration program.

Detailed information concerning these programs may be obtained from the School of Education, TCU Box 297900, Fort Worth, Texas 76129.

#### ***Certificate Program in Music***

The Graduate Performer's Certificate in Piano is offered through the graduate area in the music department. This special performance program is designed to offer the student a more concentrated study of piano performance and therefore differs from the Master of Music degree in piano performance. A complete description of this program can be seen in the music section of this bulletin.

### **Oak Ridge Associated Universities**

TCU is a member of the Council of Sponsoring Institutions of Oak Ridge Associated Universities. ORAU conducts research and educational programs in energy, health and the environment for DOE, ORAU's member institutions, other colleges and universities, and other private and governmental organizations.

The ORAU Laboratory Graduate Participation Program enables graduate students in life, physical and social sciences, who have completed all degree requirements except thesis or dissertation research, to perform full-time thesis or dissertation research under the joint direction of the major professor and a DOE staff member at a participating site. Applications for Oak Ridge Fellowships may be requested through the Office of Research and Sponsored Projects.

### **Admission**

Texas Christian University will admit qualified students without regard to race, color, religion, gender, national origin, age and veteran or handicapped status, in accordance with Title IX and other governmental regulations.

### **General Requirements**

For admission, an applicant must possess a bachelor's degree from an institution regarded as standard by the University and a regional accrediting agency.

For unconditional admission, the student must have satisfactory undergraduate preparation for the particular degree sought. This is determined by the chair of the major department and the Dean of the appropriate school/college, and includes a "B" average in either the last 60 hours of undergraduate work or in all undergraduate work; a "B" average in the major field and satisfactory scores on the appropriate tests required by the School or College.

Individual departments or schools or colleges may set different standards and require other tests. Specific departmental admission requirements are given at the beginning of the list of departmental course offerings.

An application that is otherwise satisfactory may still be rejected if the intended major area has already accepted as many new students as its facilities can accommodate, or if it is felt that the program TCU provides is not suitable to the applicant's vocational goals.

Complete and certified transcripts mailed from the registrar's office directly to TCU, from all schools attended, an application form and a Report of Health History including documentation of the required immunizations are required. These forms may be obtained from the appropriate Dean's office.

### **Undergraduate Prerequisites**

In most departments, a minimum prerequisite of 24 semester hours is required in the major field.

### **Deficiencies in Preparation**

A student who lacks certain courses prerequisite to full standing for graduate study must enroll in these as soon as possible by arrangement with the major department.\*

### **Types of Admission**

TCU provides six types of admission:

#### **1. Unconditional Admission**

Unconditional admission is granted to applicants who have met all of the general requirements for admission as well as the particular admission requirements of the department and school/college, and who have completed all admission formalities.

#### **2. Conditional Admission**

Conditional admission is granted to applicants who have completed all admission formalities, have a sufficient or superior undergraduate record, but lack certain prerequisites for the graduate program selected.

It is also occasionally granted to qualified students who have been unable to complete all admission formalities (e.g., all official transcripts have not yet arrived). The University assumes no responsibility for continued enrollment or for graduate credit if these students are denied admission upon evaluation of their completed records. These students must enroll during the regular enrollment period; late enrollment is not permitted.

Conditional admission will be changed to unconditional admission when the necessary prerequisites and/or admission formalities have been fulfilled.

#### **3. Non-Degree Graduate Admission**

Non-Degree graduate admission may be given to an applicant who (1) meets the general requirements for admission, (2) is not an applicant for a degree program, and (3) wishes to enroll for graduate work for credit.

Non-Degree admission requires completion of the appropriate application form, a letter stating why the student is requesting non-degree admission, and submission of one official transcript mailed to TCU from the registrar's office showing all work the student has previously completed. Applications for Non-Degree admission require the approval of the department concerned and the appropriate Dean's office. A maximum of 12 hours of graduate study is ordinarily permitted under Non-Degree admission.

Courses taken under this status are not normally credited toward requirements for a degree. If, at some later date, the student wants to apply for degree admission, he or she must complete all regular admission formalities. At the

time of application for degree admission, courses previously taken as a non-degree student may be evaluated for possible degree credit. Upon recommendation of the department to which the student is admitted and with approval of the appropriate Dean's office, a maximum of 9 hours taken in a non-degree status may be credited toward degree requirements.

#### **4. Visiting Graduate Student Admission**

Visiting Graduate Student admission may be granted to students enrolled in graduate programs at other universities but who desire to take courses from TCU for transfer. Students should get prior approval for this work from their graduate school since the receiving institution has the right to accept or reject transfer courses.

Requirements for Visiting Graduate Student admission are a completed application form and a letter of good standing mailed to TCU from the registrar's office of the student's institution.

#### **5. Admission for TCU Seniors**

Admission for TCU seniors is sometimes permitted. A qualified TCU senior may begin graduate work during the final bachelor's semester. He or she must be within 9 hours of completing all requirements for the bachelor's degree and must be enrolled for the courses which will fill those requirements.

A complete transcript from the Registrar at TCU is required, as well as a statement of standing indicating that the student is within the 9-hour limit of completing the degree requirements from the registrar or the academic dean is required. These materials must be submitted prior to the registration period. This admission is limited to TCU seniors only and may be for degree admission or for non-degree student admission.

#### **6. Workshop Admission**

Workshop Admission is a simplified admission procedure for the student who wishes to attend a special graduate seminar or workshop offered by TCU. Admission will be granted to applicants who hold at least a bachelor's degree from an accredited institution in the U.S. or proof of equivalent training at a foreign institution and are in good standing at all colleges and/or universities previously attended. Graduate credit will be given for grades of "B" or better. Such a student is not regarded as an applicant for a degree program.

#### **Procedures for Making Application for Graduate Study**

Applications, along with a \$50 application fee, should be sent to the following offices at Texas Christian University, Fort Worth, Texas 76129, depending on the desired field of study:

AddRan College of Humanities and Social Sciences  
TCU Box 297200

M. J. Neeley School of Business  
TCU Box 298540

College of Communication  
TCU Box 298040

School of Education  
TCU Box 297900

College of Fine Arts  
TCU Box 298000

College of Health and Human Sciences  
TCU Box 298625

College of Science and Engineering  
TCU Box 298960

Office of Graduate Studies and Research  
TCU Box 297023

In addition to the application for admission, prospective students must have two official transcripts mailed from the registrar's office, showing all previous college work, to the appropriate office. If the last school attended was TCU, the appropriate office will obtain the necessary records.

Notices of admission to graduate study are not held for release on any particular date but are sent as soon as action is taken. Successful applicants are notified of the date for which acceptance has been granted.

#### **Graduate Financial Aid Applications**

Candidates for fall admission who are applicants for financial aid should complete all application procedures by April 1 preceding the fall semester they plan to begin study. A financial aid form (if required) may be submitted at the same time as the application for admission and may be obtained from the offices listed above.

#### **Graduate Entrance Examinations**

Scores on the Graduate Record Examination (GRE), Graduate Management Admission Test (GMAT) or other appropriate professional tests must be submitted if required by the major department. The examinations are administered through the Educational Testing Service, PO Box 6004, Princeton NJ 08541-6004. See college/department listings for required tests and other admission requirements.

Information and Registration Bulletins for the GRE are usually available in the Counseling Center or in the Office of

Graduate Studies and Research; GMAT applications are usually available in the Counseling Center or the MBA Office in the M. J. Neeley School of Business. Applicants to the M. J. Neeley School of Business must submit scores from the GMAT.

### **Graduate Admission for TCU Faculty**

Members of the TCU faculty with the rank of instructor or above who meet the regular requirements for admission are eligible to register for individual graduate courses or for graduate work leading to a master's degree. However, they are not eligible to become candidates for a doctoral degree at TCU.

### **Graduate Admission for International Students**

#### **1. Admission of International Students**

Applicants from countries other than the U.S. must meet the same admission standards required of all other applicants. In addition, each international student must be proficient in the English language at the time of admission. The University requires an official score report from the Educational Testing Service of at least 550 (paper-based) or 213 (computer-based) on the Test of English as a Foreign Language (TOEFL) with no section score less than 55. Certain programs may have higher requirements. For some programs, the Test of Written English must be included.

The TCU Intensive English Program staff will provide personal interviews and/or English language exams during the orientation to ensure that every student meets the University's minimum standards with regard to the student's ability to understand, speak, read and write the English language with sufficient proficiency for graduate level studies. Any deficiencies are reported to the student's graduate director, and the student is informed as to which English and/or speech course must be taken. It is essential that any necessary language instruction be taken in the student's first term and be continued as long as is necessary to reach adequate proficiency.

With at least one year of successful coursework at an accredited U.S. institution of higher education, transfer students may request a waiver of the TOEFL requirement and the TCU proficiency testing.

#### **2. Financial Capability and Affidavits**

F-1 and J-1 international students must be able to prove financial capability in order to receive an I-20 or IAP-66. Unless they have been awarded a scholarship sufficient to cover all expenses, students must provide: **a)** TCU Financial Statement accompanied by original current bank statement/records indicating that they have sufficient funds available to cover all their educational and living expenses in the United States for the completion of their total program, or **b)** a TCU Financial Statement completed by themselves, by a member of the family or other sponsor approved by TCU, verifying financial capability and promise of support for all expenses, and by the sponsor's bank or employer verifying such financial capability and intent. Upon notification of admission, international students must pay a non-refundable \$50 advance orientation/commitment fee. The fee must be paid prior to issuance of the I-20 or IAP-66. There is an additional application fee for students applying to the MBA program.

It should be noted that some countries have strict regulations regarding amount and frequency of monetary flow out of the country. Therefore, certain international students may be required to make a TCU deposit of the estimated amount needed for the first semester of study prior to I-20 or IAP-66 issuance.

International students cannot anticipate employment as a means of financing their academic and living expenses in the U.S.

#### **3. Medical Insurance Coverage and University Health Record Requirements**

All non-immigrant international students, i.e., on student visas, must have medical insurance coverage for themselves and any accompanying dependents throughout their entire student program at TCU. An insurance plan specifically designed for non-immigrant students is made available by the University during the Orientation required of all non-immigrant students. The plan is required unless (prior to the beginning of the semester) students provide proof and description of family or agency coverage (in English), which meets the minimum insurance coverage and claims requirements of the University. The Office of International Student Services provides a copy of the minimum coverage requirements to new students with the issuance of the I-20 or IAP-66 form. (Agency-sponsored students must have an identification card, indicating that all medical expenses are covered and billable to an insurance company at an U.S. address or that the agency will promptly pay all medical expenses to the medical institution involved.)

All students must provide a completed Medical History form, which includes a record of immunizations, prior to initial registration. The form is sent to all admitted students with the I-20 or IAP-66 form.

All international students are eligible and encouraged to use the TCU Health Center. The international insurance plan covers all medical expenses in the Health Center. (Please see additional information for international students in the section entitled "Other Services.")

### **Financial Aid**

#### **Tuition and Fees**

Tuition and fees at TCU are usually set in the spring and become effective with Term I of the following summer session. Current tuition and fee schedules are available from:

Financial Services  
TCU Box 297011  
Fort Worth, TX 76129  
(817) 257-7836

Office of Graduate Studies and Research  
TCU Box 297023  
Fort Worth, TX 76129  
(817) 257-7515

or any Dean's office.

**Payment** Texas Christian University has a monthly billing cycle. Payment in full for each semester's charges is due no later than the due date specified on the first statement on which the charges for the semester appear. If full payment is not made, an optional monthly payment plan is available. A minimum payment of 25% of total semester charges is due in each monthly installment. No advance notice is required to participate in the payment plan option. However, finance charges will be assessed monthly on unpaid balances under the payment plan. More detailed information about the payment plan option is available from the Assistant Director of Financial Services, Student Services.

Payment deadlines must be met or the student may be denied advance or current registration. The ability to register in subsequent semesters may be denied if the student account is in arrears.

Transcripts will not be released nor will a degree be awarded unless the student has satisfied all financial obligations to the University, including loans made through the University.

**Miscellaneous Charges.** University Store purchases, library and parking fines, health insurance, health center services and medications, parking permits and finance charges are billed monthly.

**A finance charge** is assessed monthly on billed items not paid by the stated due date. This applies to all accounts regardless of payment plan participation. More detailed information is available from the Assistant Director of Financial Services, Student Services.

**Students Receiving Financial Aid** may participate in the payment plan option. The minimum amount due on the statement should be the total semester amount due less any financial aid awarded (except work/study, which is paid directly to the student during the semester).

### Refunds

**Tuition.** For a fall or spring semester, a student who withdraws from the university on or before the fifth class day may receive a 100 percent tuition refund. If withdrawal from the university occurs on or before the tenth class day, a 75 percent tuition refund is made. A 50 percent tuition refund is made upon withdrawal from the university on or before the 15th class day, and 25 percent tuition refund is made if withdrawal is made on or before the 20th class day.

**Students initially enrolled or reenrolled after spring 2001 semester.** For a fall or spring semester, a student who initially enrolls for 12-18 hours but drops at less than 12 hours on or before the fifth class day will be refunded the difference between the tuition portion of the semester fee and the applicable hourly tuition amount for the reduced number of hours. A student who initially enrolls for 12-18 hours but drops to less than 12 hours after the fifth class day will not receive a refund of any portion of the semester fee.

For a fall or spring semester, a student who withdraws from a class on or before the fifth class day may receive a 100 percent tuition refund for the class if the student initially enrolled for less than 12 hours and remains enrolled for less than 12 hours at the end of the fifth class day. If withdrawal from the class occurs on or before the tenth class day, a 75 percent tuition refund is made. A 50 percent tuition refund is made upon withdrawal from the class on or before the 15th class day, and a 25 percent tuition refund is made if withdrawal is made on or before the 20th class day.

**Students enrolled as of spring 2001 semester and maintaining continuous enrollment. For a fall or spring semester, a student who withdraws from a class on or before the fifth class day may** receive a 100 percent tuition refund. If withdrawal from a class occurs on or before the tenth class day, a 75 percent tuition refund is made. A 50 percent tuition refund is made upon withdrawal from a class on or before the 15th class day, and a 25 percent tuition refund is made if withdrawal is made on or before the 20th class day.

**Return of Federal Financial Aid.** A student who withdraws from the University before the 60% point in the enrollment period (summer, fall or spring) may have to return a prorated portion of the financial aid he or she received or that TCU received on his or her behalf. Detailed information about the federal policy on the "Return of Title IV Funds" is available in the financial aid office.

### Types of Financial Aid

Several types of financial aid are available to full-time graduate students. Applicants must be admissible to a graduate program, have an outstanding academic record and present favorable recommendations. Students admitted conditionally are not normally eligible for graduate financial aid until all conditions have been met. The appropriate academic Dean makes specific financial aid appointments.

In general, assistantships carry either a partial or full tuition grant and a stipend. Fellowships carry stipends and tuition remission. No student may hold both a fellowship and any other assistantship concurrently. The following appointments are available:

**Graduate Assistantships** provide a partial tuition grant, (some include a stipend), and require at least ten hours of work experience weekly in the department. These are available in most graduate departments.

**Teaching or Departmental Assistantships** provide tuition and a stipend for the academic year for a one-class-per-semester teaching assignment, or equivalent research and/or departmental duties. The maximum assignment is two classes each semester, or equivalent research duties.

**University Fellowships**, available in the doctoral programs in chemistry, English, history, physics and astronomy and psychology, provide tuition grants and a stipend. Appointments in English and History are for 9 months; in other departments for 12 months.

**Information Services Traineeships** provide tuition and stipends for an academic year. These appointments require half-time duties in Information Services and are available to graduate students regardless of field or specialization. Summer half-time appointments are available to holders of these traineeships.

**M. J. Neeley School of Business** offers a limited number of scholarships that do not include a work requirement.

**School of Education.** Because many graduate students in the School of Education are employed full-time while pursuing their M.Ed. degree, a part-time tuition assistance program (TAP) is available on a limited scale. A limited number of scholarships are also offered.

**Master of Liberal Arts.** Students enrolled in the M.L.A. program receive a partial tuition grant. A spouse enrolled concurrently in the M.L.A. program receives a larger grant. For further information, contact the Office of Graduate Studies and Research.

**City of Fort Worth employees** are eligible to receive tuition assistance in accordance with the cooperative agreement between TCU and the City of Fort Worth. (Other employed students are encouraged to check with their employer to determine if scholarship or tuition assistance is provided for this program.) For additional information, contact the Graduate Financial Aid Advisor in the Office of Scholarships and Student Financial Aid.

**Professional Development Grant (PDG).** This program offers tuition awards to qualified part-time students wishing to pursue academic credit courses. Awards are given on a first-come, first-served basis. They may not be combined with other University-administered financial aid except TAP. PDG and TAP may be awarded in the same semester, but not for the same course. For further information, contact the Graduate Financial Aid Advisor in the Office of Scholarships and Student Financial Aid.

**Endowed Awards:** Exceptional doctoral applicants may be awarded fellowships and scholarships funded by private contributions and income from the following endowments:

*The Ida M. Green Doctoral Fellowships.* Established in 1988 by Dr. Cecil H. Green of Dallas, these 12-month appointments provide full tuition and stipends to first year students in each of the doctoral programs.

*The Madelyn B. and Louis H. Barnett Scholarship Fund.* The earnings from this fund, established by the Barnetts of Fort Worth in 1969, provide full tuition and stipends for three doctoral students for one academic year.

*The Rupert and Lillian Radford Scholarships.* Established by the Rupert and Lillian Radford Trust, these scholarships provide full tuition and stipends for two doctoral students in English for one academic year.

**Extramurally Funded Awards:** Fellowships, traineeships and assistantships are available in connection with departmental research grants. Stipends vary.

Inquiries regarding graduate financial aid may be directed to the appropriate school/college.

**Residence Hall Directorships.** The hall director is a full-time staff member employed by the Office of Residential Living and Housing. Appointments are made annually for the 20 positions, which are available for members of either sex, regardless of marital status.

While holding the position of a full-time staff member, the hall director may pursue limited graduate or undergraduate studies in any area of the University. Since he or she cannot expect to pursue a full-time course of study, a master's or doctoral degree program may take more time than normal.

The hall director receives a 9-month salary. University living quarters are provided during the period of employment. Additionally, this position offers an excellent opportunity to gain experience with students in the University setting. A limited number of Residence Hall Directorships are available for the summer as well.

A special application form for residence hall directorships may be requested from the Director of Residential Services, TCU Box 297360, Fort Worth, Texas 76129.

#### Terms of Appointment

1. An appointee must enroll as a full-time graduate student each semester and summer session during which a stipend or tuition grant is drawn. In exceptional circumstances, provisions can be made for part-time students.
2. Students enrolled in a Three-Two Program must have completed all requirements for the undergraduate degree in order to receive graduate financial aid.
3. If a student's graduate work is not satisfactory, the appointment may be terminated.
4. Recipients of awards are required to pay the fees required of all other students and any tuition not covered by the award.
5. Outside employment for students holding financial aid carrying stipends is discouraged. The University assumes that the student's primary obligation is toward graduate study. The program director and the Dean of the appropriate school/college reserve the right to review any outside employment and require that the student modify the commitment to the outside employment or relinquish the financial aid appointment.
6. Stipend payments will be in accordance with the schedule set by the Payroll Office.
7. If the appointee drops courses that cause the enrollment to fall below the minimum full-time academic load, he or she will be requested to vacate the appointment.
8. The tuition remission grant is to be used during the duration of the appointment and may not be carried over for another term or semester.
9. The tuition remission grant covers courses that will be credited toward the student's degree. This may include prerequisites set by the department.

NOTE: The following guideline is used by the Payroll Office to determine taxable income: in general, any stipend

award requiring the performance of duties is considered payment for part-time employment and is therefore taxable. The student should consult a tax accountant to determine taxability.

### **Procedures for Applying for Fellowships and Assistantships**

Some departments require a special application form for financial aid in addition to the regular application for admission. This form, available from the appropriate Dean's office and/or on the web site, may be submitted at the same time as the application for admission.

Fellowship and assistantship applications for the fall semester are due between the 1st of February and the 15th of March, depending on the department. Contact the appropriate Dean's office for deadlines. Appointments are announced by April 15. Initial appointments usually are not available for the spring and summer semesters, but a few become available through resignations or vacancies.

TCU adheres to the following Resolution of the Council of Graduate Schools in the United States:

Students are under no obligation to respond to offers of financial support prior to April 15; earlier deadlines for acceptance of such offers violate the intent of this Resolution. In those instances in which a student accepts an offer before April 15, and subsequently desires to withdraw that acceptance, the student may submit in writing a resignation of the appointment at any time through April 15. However, an acceptance given or left in force after April 15 commits the student not to accept another offer without first obtaining a written release from the institution to which a commitment has been made. Similarly, an offer by an institution after April 15 is conditional on presentation by the student of the written release from any previously accepted offer.

### **Graduate Education of Ex-Service Men and Women**

The benefits available to undergraduate veterans are also available for graduate students. These matters will be cleared through the Veterans Certification Officer, Room 17, Sadler Hall, TCU.

### **Federal and State Student Financial Aid**

Graduate students may be eligible for the State Tuition Equalization Grant (for Texas residents), the Federal Work-Study Program, or the Federal Student Loan programs. Interested applicants must file the Free Application for Federal Student Aid by March 15 for fall entry and September 1 for spring entry to ensure the results are received by TCU's deadlines of May 1 and November 1 respectively. Grant and Work-Study funds are limited and may not be available after established deadlines.

Applicants selected for verification will be required to submit a copy of the previous year's federal tax return. Additional documents may be required in individual cases. Contact the Graduate Financial Aid Advisor in the Office of Scholarships and Student Financial Aid, TCU Box 297012, for additional information. The following Financial Aid Satisfactory Academic Policy applies to graduate students receiving state or federal aid (including loans).

### **Financial Aid Statement of Satisfactory Academic Progress for Graduate Students Participating in Federal or State Financial Aid Programs**

All students are required to maintain certain requirements to receive financial aid. Credit hours attempted, credit hours completed and TCU grade point average are reviewed in June to determine whether satisfactory progress is being maintained. Additionally, a student on Academic Warning will be reviewed at the conclusion of each academic semester.

The following statement outlines the requirements for satisfactory progress and how these requirements are monitored.

#### **Section I-Full-Time Graduate Student**

- A. Complete and receive academic credit for at least 18 hours annually.
- B. Maintain minimum TCU grade point average necessary for continued enrollment in the graduate programs as determined by the Dean of the school/college in which the student is enrolled.
- C. Not be on academic warning for a second semester.

#### **Section II-Part-Time Graduate Student (Less than 9 hours/semester)\***

- A. Complete and receive academic credit for a prorated percentage of the number of hours for which enrolled, compared to full-time enrollment.
- B. Maintain minimum TCU grade point average necessary for continued enrollment in the graduate program as determined by the Dean of the school/college in which the student is enrolled.
- C. Not be on academic warning for a second semester.

#### **Section III-Criteria Used To Evaluate Grades**

A. The following will be counted as credits completed:

- A
- B
- C - if offset by an "A" in the same semester or a subsequent semester
- P- if counted toward degree completion

B. The following will not be considered as credits completed:

- F
- W or Q

I (except when applied to Thesis or Dissertation hours)  
NC

#### **Section IV-Schedule of Completion of Degree Requirements**

Full-time is normally defined as nine semester hours of course work per semester. However, a student in full-time research and enrolled in 3 hours of thesis or 6 hours of dissertation, will be considered full-time. A maximum of five years is permitted for the completion of a master's degree program and six years for the completion of a doctoral degree program. Transfer work is normally not accepted and must be approved by the chair of the department and the Dean of the school/college.

#### **Section V-Financial Assistance Probation**

A student will be expected to maintain satisfactory academic progress as defined in Section(s) I-IV while in attendance. If a student does not progress at the required rate, he/she will be placed on financial aid probation. Should the student not obtain the required elements to remove himself/herself from probation or if the student is placed on academic warning a second time, the student will be placed on financial aid suspension (See Section VI).

#### **Section VI-Financial Assistance Suspension**

Financial assistance suspension is the loss of aid for a specific period. The student will not be allowed to participate in any state or federal programs, including all educational loan programs. A student will remain on financial aid suspension until he/she is removed from academic warning.

#### **Section VII-Appeals Procedure**

If a student is denied federal or state financial aid because of a lack of satisfactory academic progress, he/she may appeal the denial of such assistance. The appeal must be made in writing to the Scholarship Advisory Committee. (Appeal applications are available in the Office of Scholarships and Student Financial Aid.) The Scholarship Committee will meet in mid-July and mid-August to review appeals for the fall semester and in early January for the spring semester. Appeals must be received in the financial aid office by July 1 for the July meeting and August 1 for the August meeting. Contact the Office of Scholarships and Student Financial Aid for the deadline to submit appeals for the January meeting. The student will be notified of the decision as soon as possible after the Committee meets.

#### **Section VIII-Reinstatement of Financial Aid**

If an appeal for federal or state financial aid is not approved or if a student does not appeal, one of the following conditions must be satisfied before the student is eligible to receive federal or state financial aid again:

A student must attend TCU without the benefit of federal or other financial aid (See "Financial Assistance Suspension", Section VI for duration).

In addition to maintaining the grade point average, the student must also satisfy the requirements of the "Schedule of Degree Requirements" (see Section IV) before aid is reinstated.

#### **Policies and Procedures**

##### **Registration**

Students must be enrolled as graduate students to be eligible to receive graduate credit. Graduate students planning to enroll for courses offered outside the unit in which they will receive their degree must receive written permission to enroll from a representative of the unit offering the course. Permission to enroll must be obtained prior to enrollment. Failure to receive prior written permission may result in cancelled enrollment because of space or program requirements.

All students and prospective students are responsible for consulting and following the Academic Calendar which includes dates for the registration periods.

##### **Adding Courses/Schedule Changes**

Students wishing to change a section or add a course after formal registration should go to the Office of the Registrar. The Academic Calendar specifies the last day for adding or changing courses each semester and each summer term.

##### **Withdrawal from Class**

The purpose of student-initiated withdrawal from courses is to enhance the learning opportunity in a program of study. On recognition that a student may lack the background needed for the mastery of course content, the subject matter in a course does not match student need or interest as anticipated, or that course requirements will limit effective appropriation of learning in a semester's overall program of study, a student may officially withdraw from a course and receive a "W" in accordance with the policy stated below.

Mere absence from a class does not constitute withdrawal. In order to withdraw from a course, a student must go through official established procedure.

By following established procedures, students may withdraw from any class until five (5) academic days following the published date mid-semester reports of unsatisfactory work are due to the Registrar. The date of withdrawal for all purposes, including tuition adjustment, shall be the date of official withdrawal.

There will be no withdrawals after this date during the fall and spring semesters, or a comparable period during a shorter term.

Any student who experiences unusual hardship may seek special consideration through a written petition to the Dean of the school/college in which he/she is enrolled. Petitions should, where possible, be documented with



supporting statements from a doctor, counselor or family member. That a student is doing unsatisfactory work in a course will not be taken as sufficient reason for special consideration. If, in the opinion of the Dean, the request is justified, a grade of "Q" (dropped by the Dean's permission) may be assigned by the Dean after consultation with (1) the instructor of the course, (2) the chair of the department and (3) the Dean of the school/college in which the course is offered. Any Dean assigning a "Q" will notify the Registrar's Office.

### **Academic Load and Full-Time Status**

A student must be enrolled for a minimum of 9 hours of graduate courses to be considered a full-time resident student. However, 12 or more hours are required in some programs to meet the special regulations under which some students attend; these cases will be considered individually by the department chair and the appropriate Dean. A graduate student registering for a total of six semester hours during the three summer terms will be considered a full-time graduate student.

If a student has successfully completed all course work\* and lacks only the thesis or dissertation, he or she must be engaged in full-time research and be enrolled for a minimum of 1 hour of thesis or dissertation credit during any fall or spring semester in which the student is working with his or her committee or using University facilities. A student working with the committee or using University facilities during the summer must enroll for at least one thesis or dissertation hour during one of the three summer sessions. In addition, the student must enroll for at least one hour of thesis or dissertation in the semester during which he or she plans to complete the thesis or dissertation and take the final oral examination.

A student holding a full-time teaching assistantship or a fellowship may, upon consultation and approval of the department chairman and the appropriate Dean, be regarded as a full-time student if enrolled for a minimum of 9 hours of graduate work for credit or its equivalent in a combination of course work and research and/or teaching.

A graduate student doing no outside work may carry a maximum of 15 semester hours during each of the fall and spring semesters.

The University reserves the right to suspend or restrict the re-enrollment of any student who demonstrates that he or she is suffering an emotional, nervous or mental disorder or impairment which renders the student unable to profit from or contribute to the educational program of the University or which is harmful or disruptive to others.

### **Audit Enrollment**

Auditors are admitted to classes on a space-available basis only. A non-refundable audit fee is charged. Students wishing to audit **graduate** courses must be admitted for graduate study and have written approval of the instructor of the course for which they wish to register. Non-degree graduate students wanting to audit graduate courses must be admitted to graduate study through the Dean of the appropriate school/college and have written approval of the instructor of the course prior to registration. Students wishing to audit MLA courses must be admitted to the MLA program and have written permission from the instructor of the course prior to registration. The following regulations are applicable:

1. Laboratory and clinical classes, Day Ranch Management classes, laboratory sections of lecture classes, activity and performance classes such as the various studio art courses, music performance courses, and ballet classes may not be audited.
2. Registration to audit or change a credit class to audit is from the second day of late registration to the last day of late registration as published in the university calendar.
3. Classroom recitation and participation may be restricted at the discretion of the instructor; no grade is assigned and no credit is awarded.
4. If credit is desired, the student must register for and repeat the regular course after paying regular tuition.
5. The student's name will appear on the instructor's class roll. In order for "AU" to appear on the transcript, however, the instructor must certify at the end of the semester that the student has attended as an auditor. Audits not certified by the instructor as a final grade will be omitted from the student record.
6. Students who wish to take courses for audit **in addition** to credit courses should use an "ADD/DROP" form to add the audit class(es). These forms are available in the Office of the Registrar, Sadler Hall 19.

### **Part-Time Attendance**

Although the University encourages full-time graduate study, registration for part-time study is appropriate in several degree programs including business, software engineering, education, MLA and others.

### **Evening Classes**

In some fields, graduate work is offered in evening classes; in others, the work is given in day classes only. Prospective students should consult the schedule of classes for graduate courses offered during the evening. To receive graduate credit for such courses, students must register through the appropriate school/college and not the Office of Extended Education. All course changes must also be made through the appropriate Dean's office.

### **Summer Enrollment**

A student may not enroll in more than 3 hours in the mini-term or more than 6 hours during either a five-week term or eight-week term. When enrollment includes both an eight-week term and either a mini- or five-week term, the student's enrollment may not exceed a total of 9 hours.

### **Graduate Credit**

All credits applied to a graduate degree must be of graduate or senior-graduate rank; at least half of all course work, inclusive of thesis or dissertation, must be of graduate rank (i.e., courses with a first digit of "6" or higher).

Graduate students taking courses of "50000" rank will be required to do extra work as assigned by the instructor.

In departments listing 50000, 60000, and/or 70000 level courses, no more than 12 to 15 hours may be accrued toward the master's degree at the 50000 level. Ph.D. students must have departmental approval. No 50000 level course may be taken for credit at TCU by an MBA student unless approved on an exception basis by the MBA Academic Program Director.

No graduate credit is given for courses of less than 50000 rank taken at TCU. No graduate credit is given for undergraduate courses taken at TCU or elsewhere.

### **Academic Rating System\***

The definition of grades and grade points is as follows:

A - Exceptional - 4 points/hour

B - Good - 3 points/hour

C - Marginal - 2 points/hour

F - Failing - 0 points/hour

I - Incomplete

P - Pass

NC - No Credit

W - Withdrew

Q - Dropped by permission of the Dean

AU - Audit

A grade of "C" in a graduate course will not be accepted toward satisfaction of degree requirements unless it is offset by a grade of "A" in another graduate course carrying at least the same number of credit hours. In addition, graduate students must maintain a grade-point-average of at least 3.0 in accordance with the provisions described below under "Academic Warning." All grades of "C" or less will be included in the computation of the grade-point average, but no more than two "C" grades may be utilized in satisfying degree requirements.

An "I" grade is recorded when the student and instructor have determined that the work required for a course cannot be completed within the term of enrollment due to circumstances beyond the control of the student. Under no circumstances will a grade of "I" be given to avoid earning a grade of "F" for the course.

The "I" (Incomplete) grade must be removed within the first sixty days of the semester immediately following or it is changed to an "F." Any extension of this time must have the written approval of the instructor and Dean. This policy does not apply to graduate thesis, thesis-recital and dissertation hours. The student must secure the permit from the Registrar's office and take it to the instructor before offering work of any kind toward making up the "I" grade. The instructor is not permitted to receive make-up work until the permit is presented.

"I" grades on theses and dissertations are removed by special reporting forms when the student completes the work.

The grading policies and regulations of the school or college of a student's major apply to his or her academic studies.

### **Grade Point Average**

Two grade point averages are maintained by Texas Christian University: (1) a semester average based on courses taken at TCU during a particular term, and (2) a cumulative average based on all work attempted at TCU.

A student's grade point average (GPA) is computed by dividing the number of grade points (grade points earned per semester hour for the successful completion of academic work) by the number of hours (total credit hours attempted at TCU, excluding those attempted on a pass/no credit basis).

**Transfer Credit.** Transfer credit is added to the total number of cumulative earned hours. Transfer credit hours may satisfy degree requirements but are not used in the calculation of the cumulative GPA.

**Pass/No Credit.** Pass/no credit courses are disregarded in the calculation of the student's GPA.

### **Academic Warning\***

#### **Full-Time Students**

A graduate student who achieves a grade point average of less than 3.0 in any semester or term will be placed on Academic Warning. A student can be removed from that status by achieving a 3.0 cumulative average by the end of the next nine hours of enrollment. If the student should fail to do so, further enrollment will be granted only by the special recommendation of the chair of the department concerned and with the permission of the Dean of the school/college in which the student is enrolled.

#### **Part-Time Students**

Graduate students enrolled for less than a full load will be placed on Academic Warning when their accumulated part-time course load totals at least nine hours and falls below a 3.0 cumulative grade point average. A student can be removed from that status by achieving a 3.0 cumulative average by the end of the next nine hours of enrollment. If the student should fail to do so, further enrollment will be granted only by the special recommendation of the chair of the department concerned and with the permission of the Dean of the school/college in which the student is enrolled.

### **Dismissal, Suspension, or Expulsion for Lack of Academic Progress or Professional Misconduct**

Students may be dismissed from individual courses with a grade of "F" for lack of academic progress or for conduct deemed to be contrary to the professional or ethical standards of a field upon the recommendation of the responsible faculty member and the approval of the appropriate academic Dean.

At such times as the student fails to meet acceptable standards of academic performance or has engaged in professional misconduct, at the discretion of the Dean of the school/college in which the student is enrolled, the student may be (1) dismissed or suspended from a program of study and/or (2) expelled from the University.

If a student is dismissed, suspended, or expelled from the University, an appropriate grade or designation will be recorded for each course in progress as determined by the Dean with oversight for the course in consultation with the Dean of the school/college in which the student is enrolled.

### **Foreign Language Examination**

Each student must check on foreign language requirements and any special deadlines for their completion. The language examination, when required, is administered by the student's major department. The student is responsible for scheduling the time of the examination with the department.

### **Conferring of Degrees**

Degrees are conferred by TCU at the close of the fall and spring semesters and at the conclusion of the summer session. Students graduating in May or December must make arrangements to have examinations completed 72 hours prior to commencement exercises.

### **Transcripts of Academic Records**

Students and former students may request official transcripts of their TCU academic record from the Office of the Registrar. All transcript requests must be made by the student and must be in writing. Adequate notice, normally one week, is required for transcript processing. Transcripts cost \$2 each. Transcripts will not be released unless the student has satisfied all financial obligations to the University.

### **Interpretation of Course Numbers**

Each course is assigned a five-digit number. The first digit indicates the level at which the course is offered (5 for senior-graduate; 6, 7, 8 and 9 for graduate only). The second, third, and fourth digits distinguish one course from another within the same department. The fifth digit indicates semester hour credit; when the fifth digit is zero, it is either variable credit, non-credit or the credit includes a fraction. Thus Biology 50113 is a senior-graduate level course (first digit) for three semester hours credit (fifth digit). The three middle digits identify it as Cellular Physiology.

### **Policies and Procedures for Students with Disabilities**

Texas Christian University complies with the Americans with Disabilities Act and with Section 504 of the Rehabilitation Act of 1973 regarding students with disabilities. No otherwise qualified individual shall be denied access to or participation in the services, programs and activities of TCU solely on the basis of a disability. The University shall provide reasonable accommodations for each eligible student who (a) has a physical or mental impairment that substantially limits a major life activity, (b) has a record or history of such an impairment, or (c) is regarded as having such an impairment.

Each eligible student is responsible for presenting relevant, verifiable, professional documentation and/or assessment reports to the Coordinator of Academic Services for Students with Disabilities. Information concerning a student's disability is treated in a confidential manner in accordance with University policies as well as applicable federal and state laws. Documentation presented to the Coordinator shall be reviewed by appropriate University professional(s) to verify the existence of a disability. Further documentation may be required from the student to substantiate the claim of a disability or to assist the University in determining appropriate accommodations.

Eligible students seeking accommodations should contact the Coordinator as soon as possible in the academic term for which they are seeking accommodations. The Coordinator shall prepare letters to appropriate faculty members concerning specific, reasonable academic adjustments for the student. The student is responsible for delivering accommodations letters, conferring with faculty members, and returning validation of the receipt of information to the Coordinator. The Coordinator shall consult with the student and with University faculty and staff to ensure delivery of appropriate support services and shall serve as liaison between the student and the faculty member as needed.

Students who wish to appeal a decision regarding appropriate accommodations shall file a written request for review with the Associate Vice Chancellor for Academic Support.

### **The Family Educational Rights and Privacy Act**

This Federal law states (a) that a written institutional policy must be established and (b) that a statement of adopted procedures covering the privacy rights of students be made available. The law provides that the institution maintain the confidentiality of student education records.

The University accords all the rights under the law to its students. Students wishing access to a complete copy of the regulation and the University policy governing their educational records may do so at these locations: Vice Chancellor for Academic Affairs, Sadler Hall Room 302; Vice Chancellor for Student Affairs, Sadler Hall Room 310; Vice Chancellor for Administrative Services, Sadler Hall Room 316; Dean of Campus Life, Sadler Hall Room 101; Registrar, Sadler Hall Room 17; or Scholarships and Financial Aid, Sadler Hall Room 108.

There are six rights, which are summarized here:

- 1. The Right to Be Informed.** The University will give the students an annual notice of their rights and where copies of the policy may be reviewed.
- 2. The Right to Inspect.** Students may inspect information contained in their educational record provided they make a written request to the custodian of the records. The request must be granted no later than 45 days from the receipt of the request.
- 3. Right to Limited Control of Release.** No one outside the institution shall have access to, nor will the University disclose identifiable information from the educational records without written consent of the students, except directory information or other exceptions permitted by the Act, which the student has not refused to permit the University to disclose.
- 4. Right to Request a Change.** Students may request that the record be amended if they feel the information is inaccurate, misleading, or in violation of the rights of privacy. The University will decide whether to change the record. The student may place a rebuttal in the record.
- 5. Right to a Hearing.** If the University chooses not to amend the record, the student may request a hearing. The request must be in writing to the Vice Chancellor for Student Affairs or the Vice Chancellor for Academic Affairs. The student will be notified of the time, date and place of the hearing.
- 6. Right to Report Alleged Violations.** Students who feel their rights have been abridged may file complaints with the Family Educational Rights and Privacy Act Office, Department of Education, Washington, D.C. 20201. At its discretion TCU may provide directory information in accordance with the provisions of the Act to include: student name, address, telephone number, church affiliation or preference, name of parents of dependent students, date and place of birth, major field of study, dates of attendance, degrees and awards received, the most recent previous educational agency or institution attended by the student, participation in officially recognized activities and sports and weight and height of members of athletic teams. It is also permissible for the University to release information from a student's educational record to a parent, provided the student is a "dependent" as defined in Section 152 of the Internal Revenue Code of 1954. Students may withhold directory information by notifying the Registrar in writing. Requests for non-disclosure will be honored for only one academic year; therefore, authorization to withhold directory information must be filed annually in the Office of the Registrar.

### **Other Information**

#### ***Medical History/Immunizations***

Students attending TCU for the first time must complete a Medical History form including a record of immunizations before registration can be completed. All entering students born after 1957 are required to have had two doses of measles (Rubeola) vaccine after 12 months of age or provide proper verification that they have had the disease. The immunization must have been received after January 1, 1968, to be effective. In addition, within the 12 months prior to entering TCU, a Mantoux/TB Skin Test is required of all entering students.

#### ***Health Center and Medical Services***

The Brown Lupton Health Center consists of an outpatient clinic providing ambulatory care for the various needs of TCU students. During the Fall and Spring semesters, the clinic hours are 9 a.m. to 11:30 a.m. and 1 p.m. to 4:30 p.m., Monday through Friday. Emergency care is available 8 a.m. to 9 p.m., Monday through Friday. Convenient and economical medical services are provided to full-time graduate students by a dedicated, well-qualified staff of physicians, nurses, and ancillary personnel. Spouse and dependents of students are not eligible for care at the Health Center.

#### ***Health Insurance***

A major medical health insurance plan is available to graduate students and their dependents. To obtain coverage, an enrollment form must be completed and submitted to the Health Center during the specified Enrollment Period, which occurs at the beginning of the Fall and Spring semesters.

Non-immigrant graduate students are required to have health insurance. Information and enrollment forms will be provided by the department of International Student Services during orientation. These students must make requests for waiver consideration through International Student Services prior to registration.

#### ***TCU Career Services***

TCU Career Services provides career advising and job search assistance for all TCU students. Each year, it posts thousands of full-time professional as well as on-and off-campus part-time job vacancies on the Career Services password protected World Wide Web page. On-campus employment interviews are also coordinated through Career Services.

Graduate students who need to earn a portion of their expenses through part-time employment should contact Career Services for the job listing web address and password. Although contacting potential employers before arriving on campus is encouraged, often it is not possible to make definite arrangements for employment until arrival at the University. Contact Career Services at TCU Box 297300, Fort Worth, TX 76129 or e-mail [c.ulrickson@tcu.edu](mailto:c.ulrickson@tcu.edu).

Assistance in securing employment in the field of education is available in the School of Education Career Services Office. For information write to TCU Box 297900, Fort Worth, Texas 76129 or e-mail [d.young@tcu.edu](mailto:d.young@tcu.edu).

#### ***Drug Abuse Policy***

Students enrolled in TCU are subject to disciplinary action for the possession, manufacture, use, sale or distribution (by either sale or gift) of any quantity of any prescription drug or controlled substance or for being under the influence of any prescription drug or controlled substance, except for the use of an over-the-counter medication or for the prescribed use of medication in accordance with the instructions of a licensed physician. Controlled substances include, but are not limited to, marijuana, cocaine, cocaine derivatives, heroin, amphetamines, barbiturates, LSD, PCP and substances typically known as "designer drugs" such as "ecstasy" or "eve." Possession of paraphernalia associated with the use, possession or manufacture of a prescription drug or controlled substance is also prohibited.

The minimum penalty for a first-time violation of the Drug Abuse Policy for use or possession of a prescription drug

or controlled substance will be disciplinary probation for a full year, and a requirement for participation in a drug abuse education and/or treatment program. Any student who violates the Drug Abuse Policy for use or possession of a prescription drug or controlled substance for a second time will be suspended from the University for at least one year. Possession of drug paraphernalia will subject a student to the same penalties as those imposed for use and possession of a prescription drug or controlled substance.

The penalty for a violation of the Drug Abuse Policy for sale, distribution or manufacture of a prescription drug or controlled substance will be permanent expulsion from the University.

Adults and minors who give alcohol to minors or buy alcohol for minors also face stiff penalties. The punishment for making alcoholic beverages available to a minor has been increased from a class C misdemeanor (fine only) to a class B misdemeanor (fine and/or jail).

A student who voluntarily seeks help for drug or alcohol abuse is not subject to disciplinary action; in fact, University officials will do everything they can to assist the student in obtaining appropriate treatment. If the student continues to use drugs, then he/she does become subject to disciplinary action.

### **Standards of Professional Behavior**

Graduate students at Texas Christian University occupy a unique position in the student body. They are more mature individuals with a defined perspective for the future and a high degree of both motivation and ability. In some instances, they are both seeking advanced knowledge and transmitting knowledge through their assignments as teaching or research assistants. While preparing for the professional models characteristic of their chosen discipline, they also serve as models to others in the graduate student role. All of this brings a special obligation to evidence a level of conduct that is compatible with the University's goals to offer programs of excellence and to enrich both the community and humankind.

Graduate students are expected to be familiar with and adhere to the published academic policies, rules, regulations and procedures of the University as well as appropriate local, state and federal laws. The guiding principle is to conduct oneself in a manner that reflects well on the individual, the University and the academic process. The student is also expected to be responsible for his/her invited guests.

Violations of conduct relative to expected standards of professional behavior will be subject to disciplinary action up to and including expulsion from the University. Violations are to be reported to the Dean of the school/college in which he/she is enrolled, who will be responsible for investigating all allegations and recommending appropriate disciplinary actions.

### **Firearms and Deadly Weapons Policy**

Texas Christian University is committed to providing a safe environment for employees, students and campus visitors. Therefore, the university, in accordance with the Texas Penal Code, prohibits the possession of any firearm or deadly weapon on university property or at university-sponsored events even if an individual has been issued a license by the state. Violation of this policy will result in disciplinary action.

### **Academic Conduct Policy**

An academic community requires the highest standards of honor and integrity in all of its participants if it is to fulfill its missions. In such a community faculty, students, and staff are expected to maintain high standards of academic conduct. The purpose of this policy is to make all aware of these expectations. Additionally, the policy outlines some, but not all, of the situations which can arise that violate these standards. Further, the policy sets forth a set of procedures, characterized by a *sense of fair play*, which will be used when these standards are violated. In this spirit, this policy outlines below: (1) Academic Misconduct; (2) Procedures for Dealing with Academic Misconduct, and (3) Sanctions. These are not meant to be exhaustive.

#### **I. Academic Misconduct**

Any act that violates the spirit of the academic conduct policy is considered academic misconduct. Specific examples include, but are not limited to:

A. CHEATING. Includes, but is not limited to:

1. Copying from another student's test paper, laboratory report, other report, or computer files and listings.
2. Using in any academic exercise or academic setting, material and/or devices not authorized by the person in charge of the exercise or setting.
3. Collaborating with or seeking aid from another student during an academic exercise without the permission of the person in charge of the exercise.
4. Knowingly using, buying, selling, stealing, transporting, or soliciting in its entirety or in part, the contents of a test or other assignment unauthorized for release.
5. Substituting for another student, or permitting another student to substitute for oneself, in a manner that leads to misrepresentation of either or both students' work.

B. PLAGIARISM. The appropriation, theft, purchase, or obtaining by any means another's work, and the unacknowledged submission or incorporation of that work as one's own offered for credit. Appropriation includes the quoting or paraphrasing of another's work without giving proper credit.

C. COLLUSION. The unauthorized collaboration with another in preparing work offered for credit.

D. ABUSE OF RESOURCE MATERIALS. Mutilating, destroying, concealing, or stealing such materials.

E. COMPUTER MISUSE. Unauthorized or illegal use of computer software or hardware through the TCU Computer Center or through any programs, terminals, or freestanding computers owned, leased or operated by TCU or any of its academic units for the purpose of affecting the academic standing of a student.

F. FABRICATION AND FALSIFICATION. Unauthorized alteration or invention of any information or citation in an academic exercise or academic setting. Falsification involves altering information for use in any academic exercise or

academic setting. Fabrication involves inventing or counterfeiting information for use in any academic exercise or academic setting.

G.MULTIPLE SUBMISSION. The submission by the same individual of substantial portions of the same academic work (including oral reports) for credit more than once in the same or another class without authorization.

H.COMPLICITY IN ACADEMIC MISCONDUCT. Helping another to commit an act of academic misconduct.

I.BEARING FALSE WITNESS. Knowingly and falsely accusing another student of academic misconduct.

## II. Procedures for Dealing with Academic Misconduct

### A. DEFINITIONS

1. Day refers to a school day on which classes are meeting.

2. Academic Dean refers to the Dean of the school/college offering the course in which the academic misconduct is alleged to have taken place.

3. Department chair refers to the academic administrator responsible for the unit providing the instruction in which the alleged academic misconduct occurred.

4. Faculty refers to the instructor of the course in which the suspected academic misconduct occurred.

5. Advisor refers to any person selected by the student who accompanies the student during formal hearings. The advisor may speak with the student but may not actively participate in the hearings.

6. The Academic Appeals Committee is a standing University Committee. The charge and membership of the Committee may be found in the current *Handbook for Faculty and University Staff*.

### B. INVESTIGATION AND INITIATION

1. Students who know of an act of academic misconduct should report the incident to the faculty member teaching the course. The faculty member will obtain the basic facts of the allegation and ask the student reporting the misconduct to write and sign a statement of facts. The name(s) of the student(s) reporting suspected academic misconduct will remain confidential during the informal faculty/student meeting, but must be revealed to the accused student if the resolution proceeds beyond the faculty member and the accused student.

2. Faculty who suspect academic misconduct or who have academic misconduct reported to them must initiate an investigation and meet with the accused student within five days of becoming aware of the incident. A faculty member who is made aware by another person of an act of academic misconduct has the responsibility to investigate the allegation, and, if warranted, pursue the issue as outlined below (C.1).

3. In instances where the suspected academic misconduct is discovered during an academic exercise, the faculty member has the right to suspend immediately the student involved in the alleged activity from further work on the academic exercise.

4. A student, once accused of academic misconduct, will proceed in the course without restriction until resolution of the issue or until the academic Dean has taken an action as specified in III.B that removes the student from the course.

5. An "I" grade should be given by the instructor if the alleged misconduct occurs near the end of a semester, for example, during finals, and a sanction outlined in section III has not been applied by the instructor or the Dean.

6. If more than one student is accused of the same act of misconduct (e.g., giving and receiving aid), each individual student is guaranteed the right to have the cases heard separately. With each student's permission, the cases can be combined. The faculty/student conference (C.1) is excepted from this requirement.

### C. RESOLUTION

1. *Meeting Between Faculty Member and Student*. This is the first step to be taken in resolving an incident of suspected academic misconduct.

a. Within five days of suspecting misconduct, the faculty member will hold a meeting with the student. At this meeting, the faculty member will inform the student of all allegations against him or her and present any information supporting the allegations.

b. The student will be given the opportunity to respond to the allegations. The student has the right not to respond.

c. The faculty member will decide whether or not academic misconduct has occurred, and, if warranted, apply any combination of sanctions in III.A below, or refer the matter to the Dean for more severe sanctions (probation, suspension, or expulsion). Findings of academic misconduct are based on the preponderance of the evidence.

d. The faculty member will notify the student in writing of his or her decision and may send copies to the academic Dean, the Dean of the school/college in which the student is enrolled, the department chair, and the Dean of Campus Life. Any such copies of the findings will be kept on file in the college and department offices and in the student discipline files maintained by the Dean of Campus Life.

2. *Meeting with Department Chair*. This meeting takes place when the student wishes to appeal either the findings of the faculty member or the severity of the sanction(s).

a. Within five days of being notified by the faculty member of the disposition of the incident of academic misconduct, the student may request a meeting with the department chair.

b. The department chair will become acquainted with the facts and meet with the parties involved in the case. The student has the right to meet with the department chair without the faculty member being present.

c. The department chair may either support or reverse the findings of the faculty member, and may lessen the sanction(s) imposed by the faculty member even while supporting the findings. The chair may not increase the severity of the sanction(s).

d. The department chair will notify the student and faculty member of his or her decision in writing and may send copies to the faculty member, the academic Dean and the Dean of Campus Life. Any such copies of the findings will be kept on file in the college and department offices and in the student discipline files maintained by the Dean of Campus Life.

3. *Meeting with Academic Dean*. This meeting takes place if the student wishes to appeal either the findings of the department chair or the severity of the sanction(s), if the faculty member recommends sanctions in addition to those listed in III.A.3 and 4 or if the student has been found guilty of academic misconduct previously.

a. Within five days of being notified by the chair of the disposition of the incident of academic misconduct, the student may request a meeting with the academic Dean.

b. The academic Dean will hear the facts of the case and make a decision about the alleged act of academic misconduct or the appropriateness of the sanctions administered by the faculty member. The academic Dean can issue any combination of sanctions listed in III.

c. The academic Dean will notify the student of his or her decision in writing with copies to the department chair and the faculty member. Copies of the findings will be kept on file in the college office and may be sent to the Dean of Campus Life.

4. *Academic Appeals Committee.* Should the student wish to appeal the decision of the academic Dean, he or she has the right to request a hearing before the Academic Appeals Committee.

a. The student must request this hearing by submitting an appeal letter to the chair of the university Academic Appeals Committee no later than five days from the date of receiving written notification of the Dean's findings.

b. Upon receipt of the appeal letter, the Chair of the Academic Appeals Committee may request materials from the student, the faculty member, the department chair, and/or the Dean.

c. The appealing student has the right to appear before the Academic Appeals Committee. The student may bring one person with him or her as an advisor. The advisor may not speak for the student or to the committee. The advisor may only speak with the student. The student must inform the university five class days in advance if his or her advisor is an attorney in order for the university to also have an attorney present. Each party shall bear the expense of his/her legal counsel. Legal counsel is to provide counsel only and may not participate directly in the meeting. The meeting is an administrative hearing, not a court proceeding, and is not subject to the procedures or practices of a court of law.

### III. Sanctions

#### A. BY THE FACULTY MEMBER:

1. Grant no credit for the examination or assignment in question (treat as a missed assignment).
2. Assign a grade of "F" (or a zero) for the examination or assignment in question.
3. Recommend to the academic Dean that the student be dropped immediately from the course with a grade of "F."
4. Recommend to the academic Dean that the student be placed on probation, suspended or expelled from the University.

#### B. BY THE ACADEMIC DEAN OR ACADEMIC APPEALS COMMITTEE:

(Previous academic misconduct will be taken into account when either the academic Dean or the Academic Appeals Committee considers sanctions for academic misconduct.)

1. Apply sanctions in III.A.
2. Drop student from the course with a grade of "F." This grade cannot be changed by student-initiated withdrawal and the grade will be included in the computation of GPA even if the course is repeated.
3. Place the student on disciplinary probation at the University for a specified period of time.
4. Place the student on suspension from the University for a specified period of time.
5. Expel the student from the University.
6. In a case where the academic Dean as defined above is not the Dean of the school/college in which the student is enrolled, he or she shall recommend to the Vice Chancellor for Academic Affairs that the student be placed on probation, suspended or expelled.

### Student Grievance Procedure

The University has established both informal and formal procedures which a student may follow when presenting grievances. A grievance is defined as any dispute or difference concerning the interpretation or enforcement of any provision of University regulations, policies or procedures or state or federal laws applicable on the campus. Administrators, faculty and students are encouraged in all instances to resolve grievances informally, and as promptly as possible. However, formal procedures may be followed when needed.

Detailed information about the University Judicial System is given in the Student Handbook, available at the beginning of each fall semester. Individuals who have additional questions about how to gain access to the system may contact the office of the Dean of Campus Life.

### Master's Degree Requirements

In addition to the general academic regulations on the preceding pages, the particular requirements of the master's degree are given below and in the departmental listings which follow.

#### Residence Requirement

The minimum residence requirement for all master's degrees is two consecutive long semesters or their equivalent.

#### Transfer Credit

Graduate credit earned from another accredited college or university will be considered for transfer to a master's program at TCU. Written request for transfer credit, with appropriate transcripts, should be made at the time of application for admission. Such credit must be applicable to the student's program as determined by his or her adviser, carry at least a "B" grade, and be residence credit, not extension or correspondence. Six semester hours of transfer credit usually is all that will be accepted, but under special circumstances additional hours may be considered subject to approval by the chair of the major department and the Dean of the school/college.

Permission to interrupt residence to earn graduate credit elsewhere for use on a TCU degree must be approved in advance with a formal request addressed to the Dean and conferral with the department involved.

#### Advisory Committee\*

An advisory committee of three faculty members is appointed by the Dean for each graduate student after completion of the equivalent of a full semester of graduate work, usually 12 hours.

Until the student receives notice of the appointment of an advisory committee, he or she should consider the chair of the major department as the adviser, unless the department otherwise makes provision.

#### Admission to Candidacy\*

A student pursuing a master's degree will have a petition to candidacy prepared by the Dean's office after 9 or more hours of course work have been completed, and after all conditions to admission have been met, including the pertinent aptitude test records, departmental or other required examinations, and foreign language requirements, if any. The student does not need to make a formal request for candidacy.

Registration for the second half of the thesis will not be accepted until all requirements for candidacy have been fulfilled. Until that time the student is not considered a candidate for a degree.

### **Intent to Graduate**

At the beginning of the semester in which the student plans to graduate, he/she must obtain from, fill out and return to the appropriate Dean's office, an Intent to Graduate form. In the event that graduation cannot be completed, a cancellation form must be filed in the Dean's office. An Intent to Graduate form must be refiled in case of postponement. A non-refundable graduation fee, which includes all graduation costs except the microfilming or binding of a thesis, is charged when the intent is filed.

### **Thesis Preparation**

The thesis required in many of the master's degree programs represents the climax of the student's program and is expected to demonstrate thoroughness of research, keenness of analysis, and effectiveness of expression.

A student is required to register for at least 6 hours of thesis, and must register for at least one hour during any fall or spring semester in which the student is working with committee members or using University facilities. Check specific department listings for further restrictions. During the summer the student must enroll for at least one thesis hour during at least one of the summer sessions. In addition, the student must enroll for at least one hour of thesis in the semester in which he or she plans to complete the thesis and take the final oral examination.

General instructions for preparing and presenting theses should be obtained from the appropriate Dean's office well in advance of the actual thesis writing. The form presented in the manual should be followed in all cases unless a recognized professional variation is authorized by the major department under agreement with the Dean.

The thesis subject must be approved by the advisory committee, who should be consulted frequently in the progress of the thesis so that proper guidance may be given. All members of the committee should approve the thesis draft before the final typed copies are made. Students should particularly note the special deadlines for thesis preparation and distribution. These deadlines may be obtained each semester from the Dean's office.

Four copies of the thesis are normally submitted. After final approval, the first and second copies are deposited with the TCU library and the third copy presented to the department or thesis director. The fourth copy will be returned to the student. There is a required fee for any dissertation microfilming and for binding the two library copies of the thesis. This figure may change without notice. The student will pay an additional binding fee for any other copies he or she wishes to have bound.

### **Final Oral Examinations**

Each candidate for a master's degree (except in the School of Business and the M.L.A. program) must take a final oral examination covering all work taken for the degree, including the thesis, if any. The examining committee will be composed of the candidate's advisory committee, and others as may be designated by the major department. The examination may not take place later than the date listed in the Deadlines for Graduate Students each semester.

The candidate must show satisfactory completion of all courses in the degree program, except those in progress, before the oral examination may be given. Only one re-examination on a failed oral will be permitted, the date to be set at the discretion of the examining committee. In addition to the final oral examination, written examinations may be required at the discretion of the major department.

A student must be enrolled for a minimum of one hour of credit during any term (fall, spring, or any one of the three summer sessions) in which the student is using University facilities, working with faculty or taking the final oral examination.

### **Summer Completion of Degree Programs**

A student planning to complete the thesis and/or oral examinations during the summer, particularly during the second 5-week term, should check with advisory committee members prior to the end of the spring semester to affirm that their schedules will make them available during that period.

### **Time Limit**

The student is expected to complete work, including thesis if required, within a period of five years from the date of the earliest credit to be counted on the degree (including transfer credit, if any). See M.J. Neeley School of Business "Program Length" for its requirement.

Extension of time must be applied for in writing through the chair of the major department who will then make a recommendation to the Dean of the school/college. The letter should explain why the degree was not completed within the time limit and should present a schedule for completing the program.

Additional courses may be assigned to students who do not complete the degree within the time limit.

### **Ph.D. Degree Requirements**

#### **Fields**



The Ph.D. degree is available in five areas: chemistry, English, history, physics and psychology.

### **Relation to the Master's Degree**

A master's degree is not necessarily prerequisite to candidacy for the Ph.D. degree. A student entering a doctoral program after obtaining a master's degree would normally be classified as being in the second year of graduate study, as defined below.

### **Program of Study**

The Ph.D. degree is essentially a research degree. Although course work is a necessary part of the program, the mere accumulation of course credits will not be sufficient for attaining this degree.

The Ph.D. degree may be completed in three years at the minimum. Under the minimum program, the first two years will be given to course work, seminars and related research. The third year primarily will encompass dissertation research.

Students whose preparation is incomplete or who will be engaged in part-time teaching or paid research will extend their programs accordingly. In such cases, a four- or five-year program would not be unusual.

Departments may, at their discretion, require that a formal minor be included in the total program. A formal minor requires at least 6 hours credit beyond the master's or 12 hours beyond the bachelor's degree.

All students in the doctoral programs are required to do a certain amount of teaching or research, appropriate to the goals of the student, as part of their training for the advanced degree.

Students must register for a minimum of 6 semester hours of course work or dissertation in each semester or summer session during which they utilize University research facilities or occupy a library carrel.

### **Residence Requirement**

The second year or its equivalent must be completed in continuous full-time residence at TCU. Residence should not include dissertation hours.

"Second year" is defined as the period equivalent to the second year of a minimum three-year program. "Residence" is defined as attendance at on-campus classes or on-campus directed study. "Full time," in general, requires that a student be enrolled for a minimum of 9 hours of graduate courses per semester or its equivalent in a combination of coursework, teaching and research.

Residence must be the academic year of consecutive fall and spring semesters.

### **Foreign Language Requirement**

Individual departments specify the conditions and policies for meeting foreign language requirements. Consult the departmental graduate adviser for this information.

Any one of the following may satisfy the general requirement of the University for proficiency in a foreign language:

1. Recent completion of the second college year of an approved language with an average of "B" grade minimum.
2. Demonstration of reading knowledge by an examination administered by the student's major department, with the examination over selected literature in the student's major field.
3. Presentation of a certificate of completion of a similar foreign language examination for another graduate school.
4. Presentation of satisfactory scores on the Graduate Foreign Language Test of the Educational Testing Service.

The foreign language requirement must be satisfied prior to admission to candidacy. An international student may request that his or her native language be accepted, but it must be one which is needed for research at TCU. He or she must demonstrate ability to translate this language into English and, if no examiner is available in the foreign languages department, pay any required fee for employment of an approved interpreter. The substitution must have the approval of the chairman of the major department and the Dean of AddRan College.

### **Advisory Committee**

An advisory committee of at least four persons will be assigned to the doctoral student by the Dean on the recommendation of the major department. The committee will be appointed early during the second year and should consist of those persons under whom the student will take his or her qualifying examinations, including at least one person from the minor field, if any. This committee, with the student's dissertation director as chair, formulates the remainder of the student's program of study and submits it to the Dean for approval.

### **Qualifying or Preliminary Examinations**

All doctoral programs require some form of qualifying or preliminary examinations. It is the purpose of these examinations to evaluate the student's capability for advanced creative analysis and synthesis in the major specialization and in the related disciplines.

The qualifying examination may not be taken earlier than the second semester of the second year of the student's graduate program. At least one language requirement must be completed prior to taking the qualifying examination. This examination will cover the major field, designated sub-fields and minor, if any. It must be written, or written and oral.

Only one re-examination will be permitted, and this only after such time interval and under such conditions of additional study as the advisory committee may decide. Each student should consult the departmental requirements listed in the "Courses of Instruction" section for specific information regarding the type of

examination, the fields to be covered and the expected completion date.

### **Admission to Candidacy**

A student becomes a "candidate" for the Ph.D. degree upon passing the qualifying or preliminary examinations and meeting the foreign language requirements of the department, provided he or she has also made up any course deficiencies and the Graduate Record Examination scores have been recorded. The student does not need to make a formal request for candidacy.

### **Intent to Graduate**

At the beginning of the semester in which the student plans to graduate, he/she must obtain from, fill out and return to the AddRan Dean's office, an Intent to Graduate form. In the event that graduation cannot be completed, a cancellation form must be filed in the Dean's office. An Intent to Graduate form must be refiled in case of postponement. A non-refundable graduation fee, which includes all graduation costs except the microfilming or binding of a dissertation, is charged when the intent is filed.

### **Dissertation Preparation**

A dissertation is required in all doctoral programs. It must demonstrate superior research abilities, capacity for sound independent analysis and judgment and effectiveness of expression. A student is required to register for at least 12 semester hours of dissertation and must register for at least one hour during any fall or spring semester in which the student is working with committee members or using University facilities. Check specific department listings for further restrictions. During the summer the student must enroll for at least one dissertation hour during at least one of the summer sessions. In addition, the student must enroll for at least one hour during any fall or spring semester in which he or she plans to complete the dissertation and take the final oral examination.

Registration for the first half of the dissertation will not be accepted until the major department notifies the Dean's office in writing that the student is eligible for dissertation registration. Registration for the second half will not be accepted until the student has been admitted to candidacy, and until that time he or she is not considered a candidate for a degree.

Instructions for preparing and presenting dissertations and copy preparation for microfilming available from the appropriate dean's office. Students should obtain a copy of the manual well in advance of actual dissertation writing, and should follow it in detail. The form given in the manual should be followed in all cases unless a recognized professional variation is authorized by the major department under agreement with the Dean.

As early as possible each student should initiate a program of individual reading and study leading to the selection and development of the dissertation research. This program should proceed under the supervision of the chair and other members of the advisory committee. At least three, and preferably all, members of the committee should approve the draft of the dissertation before the final typed copies are made. The student should note the special deadlines for dissertation preparation and distribution available each semester.

Students are required to submit the original and one copy of the dissertation for binding and placement in the TCU library. University Microfilms, Ann Arbor, Mich., will microfilm an extra-unbound copy and a 350-word abstract, and the abstract will appear in Dissertation Abstracts. The resulting copy of the dissertation will be available for purchase by all that request it. Copyright may be obtained; the fee for this optional service is currently \$35.00.

University Microfilms will return the unbound copy to the TCU library, for disposition as the student indicates. The required fee for publishing the abstract, microfilming the dissertation, placing a positive copy of the microfilm in the TCU library and binding the original and second copies is \$70.00. (This amount is subject to change without notice.) In addition, the student will pay the binding fee for any other copies he or she wishes to have bound.

Students usually submit a minimum of five copies of the dissertation. The first two are deposited with the TCU library, the third is given to the dissertation director, and the fourth and fifth copies are returned to the student.

### **Final Oral Examination**

Each candidate for a doctoral degree must take a final examination covering the dissertation and related fields. The examining committee will be composed of the candidate's advisory committee and others as may be designated by the major department.

The final oral examination will be announced and open for audit to the graduate faculty and to others invited by the advisory committee. The examination may not be held later than the date listed in the Special Deadlines for Graduate Students.

Only one re-examination on a failed oral examination will be permitted, the date to be set at the discretion of the examining committee.

A student must be enrolled for a minimum of one hour of credit during any term (fall, spring, or any one of the three summer sessions) in which the student is using University facilities, working with faculty or taking the final oral examination.

### **Time Limit**

The work for the Ph.D. degree must be completed within six years after the student has been admitted to candidacy. Extension of time must be applied for in writing through the chair of the major department who will then make a recommendation to the appropriate dean. The letter should explain why the degree was not completed within the time limit and should present a schedule for completing the program.

### **Academic Services**

### **The Library**

Research, study and independent inquiry at TCU are greatly facilitated by the collections and services of a centralized university library. The Mary Couets Burnett Library is a modern, attractive and well appointed building complex with over 158,000 square feet dedicated to services and materials storage. The library houses a collection of more than 1.9 million items and maintains current subscriptions to some 4,800 journals. Materials are classified and arranged according to the Library of Congress system; open stacks afford convenient access to most items. Professional librarians and support staff select, maintain and interpret the collections for library users. Particular collections include Texas, United States and European Community documents; the Archives of the Van Cliburn International Piano Competition; the papers of former Speaker of the House, James C. Wright, Jr.; the papers of Amon G. Carter, Sr.; the University's historical collection; and special collections of rare books and manuscripts such as the William Luther Lewis Collection of English and American Literature. A music library and audio center; the Brite Divinity Library; and a computer lab are also located within the library building.

The TCU Library maintains a dynamic web site which serves as a gateway to information within the library and to the world at large. Recently the library's Reference Department and the Information Services Help Desk have joined forces and become the Information Commons. Students and faculty can now get research help and technical assistance when they need it, where they need it. The Writing Center has evening office hours in the Information Commons. The TCU library provides its students and faculty with over 200 databases, such as Lexis-Nexis and Medline, and almost half of its journals are available online to be accessed from dorm rooms and offices. The Information Commons houses over one hundred computers and a number of laptops to be used anywhere in the library, with wireless Internet connections.

Through active membership in local, regional and national library consortia the Library is able to secure for TCU faculty and students the advantages that come with library resource sharing. Our membership in TexShare enables TCU faculty and students to obtain borrowing privileges from more than 150 academic libraries throughout Texas.

### **Information Services**

Using various client servers, Information Services provides support for all programs used by campus departments and supplies direct access to the Internet, the Library and specialized databases as required.

The Information Services staff is available through the Information Commons Desk in the Mary Couets Burnett Library (817-257-5855). Services provided include consultation and assistance with computer problems. A newsletter (TCUSER) providing information about new services, products and support activities is published each semester. In addition, a wide selection of training materials for campus-supported software is also available. The Information Services administrative office is located in SWR Room 175, (817) 257-7682.

The Information Services staff is available through the HELP DESK (SWR Room 148, (817) 257-5855) for consultation and assistance with computer problems, as well as the selection and purchase of hardware and software. A newsletter (TCUSER) providing information about new services, products and support activities is published electronically each semester. Various classes on using the administrative software packages are offered for faculty and staff each semester. In addition, a wide selection of training materials for campus-supported software is also available. The Information Services administrative office is located in SWR Room 175, (817) 257-7682.

### **The William L. Adams Writing Center**

The Writing Center offers assistance with writing projects and assignments to all TCU students. Staffed by professional writing instructors and peer tutors, the Writing Center provides students one-on-one tutorials free of charge. Conferences usually focus on a particular project or assignment but may also include general writing instruction.

In addition, the Writing Center's computer lab includes 12 PCs equipped with Office 2000 and access to e-mail and the Internet.

The Writing Center is temporarily located in the basement of the Student Center but is scheduled to move back to the Rickel Building by the end of the fall 2002 semester. The Center is open 8 to 5 p.m. Monday through Friday. Students may make an appointment by calling (817) 257-7221 or can drop by and wait for the next available tutor. Students may also use the Writing Center at the library on Sunday through Thursday evenings from 6 to 9 p.m. or take advantage of the new on-line tutorial service (instructions available on the Writing Center website at <http://gamma.is.tcu.edu/wrt/>).

### **Other Services**

#### **University Ministries**

University Ministries is the visible focus for an ecumenical and inclusive ministry with students, faculty and staff. These ministries of worship, care for persons, social justice, fellowship, nurture and other dimensions seek to integrate matters of faith into the routine life and work of the University. The offices are on the first floor of the Student Center and are a gathering place for a full range of programs, services and ministries that enable respect for diverse beliefs.

Through direct involvement in campus organizations, residence halls, campus-wide events, or through personal interaction, University Ministries seeks to provide opportunities for ethical choice and to assist members of the TCU community to examine the implications of faith in our lives. University Chapel, held each Wednesday at noon during the regular University session, is a weekly opportunity to celebrate the ecumenical spirit of the Christian faith. Roman Catholic Mass is held weekly on Sunday evenings. A wide variety of study, retreats, fellowship, service, and care of persons is available through several denominational ministries as well as through the ecumenical expression of the Uniting Campus Ministries.

Many people find themselves in need of temporary or on-going pastoral care assistance to resolve personal,

interpersonal, family, or other concerns. Strict confidentiality is maintained for these services and provided without charge.

Students, faculty and staff are urged to discover a local congregation for the important aspects of life in a gathered community of faith. Students of all creeds and faiths are welcome at TCU and in the programs of University Ministries. Direct assistance is provided in expressing individual traditions as well as making contact with community churches, temples, synagogues, mosques and congregations.

### **The Counseling Center**

The Counseling Center provides psychological and psychiatric evaluation services for students on a short-term basis. Students requiring long-term services will be referred to professionals off campus. The staff includes a full time psychiatric medical director, 2 clinical psychologists, and 2 licensed professional counselors. Services are provided confidentially.

Services provided focus on helping students cope with personal concerns as they engage in their academic, social and personal activities. Typical student needs and concerns include learning to study more effectively, resolving interpersonal conflicts, managing stress, coping with loneliness, and handling feelings of depression, anxiety and other emotional crises.

Psychiatric medication management, individual, and group counseling services are available to assist students. In addition, presentations are made to residence halls, classes, and campus organizations on a wide variety of topics in mental health.

The Assessment Program of the Counseling Center helps students learn more about their aptitudes, achievements, interests, values, and personality. In cooperation with other campus departments, services are also available to students related to learning disabilities. The College-Level Examination Program (CLEP) and national tests for admission to graduate schools are administered by the Counseling Center.

### **International Students**

TCU has a comprehensive program to help international students adjust to a new living environment and to share their backgrounds with U.S. students.

The Office of International Student Services provides advice and assistance regarding immigration matters, academic, monetary and other personal concerns. It can help in establishing a relationship with a Community Friendship Family, in understanding U.S. culture, customs and laws and in student relations with the various administrative and departmental offices of the University.

The International Student Association (ISA) is an integral part of the University's International Student Program, providing social, educational and community opportunities for its members and is open to all students. International students are encouraged to become active members. All new international students automatically become members of the ISA upon completion of an information form during orientation.

All students who are not citizens or permanent residents of the United States are required to report their arrival to the Office of International Student Services within two days of their initial arrival or within two days after any subsequent re-entry into the U.S. They must also report any change of data recorded on the Personal Data form that is on file in the Office of International Student Services.

All non-immigrant and international students on a visa and any accompanying dependents must be covered by the International Student insurance plan throughout their period of studies at TCU unless a waiver is requested and approved through the International Student Services Office prior to orientation. The coverage becomes effective one day prior to orientation and the cost for insurance is billed to the student account. All students must also provide the University with a completed TCU Health Record prior to initial registration.

Information on the admission requirements and procedures for international students is in the Graduate Admission for International Students section of this bulletin.

### **Student ID Card**

Your TCU ID Card is your access key to many University resources. It is permanent and may be used as long as you are enrolled at TCU. If at any time you have any questions or problems with your ID Card, contact the ID Card Center in the Student Center, Room 221 or phone (817) 257-7856.

**How it works.** Your ID is a computerized plastic card, bearing your photo and TCU ID number, with a magnetic stripe on the back. Each time the card is inserted in a card reader, the data encoded in the magnetic stripe is electronically scanned and sent back to a central computer for verification. The system then transmits whether the card is valid and the transaction accepted.

**Where to use your card.** You will use your card for: Dining Services, TCU Book Store send home charges, copying in the Library and Frog Prints, entry into the Rickel Building, Health Center services, athletic event admission, admission to many TCU events, voting in student elections, and to verify identity if requested by TCU Police. In some residence halls your card is used for: door access, laundry, and soda and snack vending machines.

**Lost or Stolen.** Card owners are responsible for reporting lost or stolen cards PROMPTLY, to assure that no one else uses your card. Report lost or stolen cards to The ID Card Center (Student Center, room 221, (817)

257-7856), TCU Police (257-7777), or any dining services area cashier. Until one of these agencies has been notified, you are responsible for any purchases with your card. There is a replacement charge of \$10.00 for a lost or stolen card.

**Please remember.** The ID Card remains the property of the University at all times and any abuse of the card could result in loss of privileges. Your card should be in your possession at all times and must be surrendered upon the request of any University official. Upon leaving the University, you must turn in your ID card to your Hall Director or RA, a Fraternity Hall Director, the Dean of Campus Life, or the University ID Card Center.

#### Automobile Regulations

All students, faculty and staff who operate a motor vehicle on University property must register that vehicle with TCU Police Department. The annual Registration fees are specified in the University Parking and Regulations brochure. All fees are payable in the Controller's Office.

Any student who complies with parking and traffic regulations may operate a motor vehicle on campus. The University does not assume any liability concerning the protection of the motor vehicle or any responsibility for providing special parking places near a student's residence hall.

Illegally parked vehicles may be ticketed, immobilized, or towed by the TCU Campus Police Department. Fines are payable at the Controller's Office. Continued parking offenses may lead to a suspension of campus driving and parking privileges and may also result in disciplinary action by the University. Whenever it is necessary to move an illegally parked vehicle, it will be towed by an independent wrecker operator to the wrecker's storage area. The owner of the vehicle will be responsible for the wrecker fee and storage plus the fine for the traffic violation.

#### Campus Police

TCU Police Officers are commissioned by authority of the Board of Trustees of Texas Christian University and are certified as peace officers by the State of Texas to provide protection for personnel and property on campus. The Campus Police are in service 24 hours a day, seven days a week, and the Campus Police dispatcher can be contacted at any time by telephone, Area Code (817) 257-7777. The office is located at 3025 Lubbock.

#### TCU Police Programs

##### **Student Escort Program (Froggie Five-O)**

The TCU Police Department administers a student escort program, Froggie Five-O, which operates between the hours of 7:30 p.m. and 12:30 a.m. throughout the school year. Froggie Five-O escorts drive golf carts to all areas of the campus and can offer student transportation between academic buildings and residence halls. Students may request an escort by using any of the 25 emergency telephones located on campus or by calling the University Police at (817) 257-7777. Uniformed security guards are offered 24 hours a day.

#### Campus Crime Watch

These programs are of a neighborhood watch nature with the TCU campus being the neighborhood. Meetings for the programs are open to all students, faculty, staff, and friends. The TCUPD Crime prevention specialist hosts the meetings and provides speakers on subjects of interest to campus community members.

#### Crime Prevention

Crime and other services are offered by TCUPD and the Fort Worth Police Department's Community Service Office and include: Sexual Assault/Acquaintance Rape Prevention, Personal Awareness/Campus Alcohol Police Information, Campus Crime Watch Meetings, Crime Prevention Surveys for Home and Business, "Operation ID: Property Identification System, Auto Theft Prevention (Window Etching) and, Vehicle "Jump Starts" (Due to possible problems with electric locks, TCUPD is unable to provide vehicle unlocking services).

#### RAD Systems

RAD stands for Rape Aggression Defense system. The program has been offered on the TCU campus for several years. RAD teaches women defensive concepts and techniques against various types of assault by utilizing easy, effective, and proven self-defense/martial arts tactics. RAD provides effective options by teaching women to take an active role in their own self-defense and psychological well being. The RAD program was developed for and is offered to females.

#### Lost and Found

The Campus Police is the official lost and found office. Articles lost or found should be reported as soon as possible to help the office in returning property to the rightful owner.

#### Waiver of Responsibility

The University takes reasonable steps to protect people and property on the campus. However, it is impossible to provide protection that is 100 percent effective and the University does not accept responsibility for bodily injury, theft or damage to personal property occurring on the campus. Students are encouraged to assure that their own insurance coverage is adequate.



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# Academic Calendar

[Spring Semester 2002](#) [Summer Session 2002](#) [Fall Semester 2002](#) [Spring Semester 2003](#) [Summer Session 2003](#)

## Fall Semester 2002

**August 26 through December 20**

Residence halls opening	<b>Sat., Aug. 24</b>
Registration	<b>Mon., Tues., Aug. 26-27</b>
First classes meet, 8 a.m.	<b>Wed., Aug. 28</b>
Labor Day recess	<b>Mon., Sept. 2</b>
Last day for late registration, changing or adding courses	<b>Wed., Sept. 4</b>
Last day for semester-fee students (only) to drop below 12 hours and receive partial-tuition refund	<b>Wed., Sept. 4</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Wed., Sept. 4</b>
75% tuition refund	<b>Wed., Sept. 11</b>
50% tuition refund	<b>Wed., Sept. 18</b>
25% tuition refund (No refunds after this date.)	<b>Wed., Sept. 25</b>
Last day for electing Pass/No Credit grading option	<b>Wed., Sept. 25</b>
<i>Mid-semester break:</i>	
Classes recess, 10 p.m.	<b>Thur., Oct. 10</b>
Classes resume, 8 a.m.	<b>Mon., Oct. 14</b>
Mid-semester reports of unsatisfactory work to Registrar, 9 a.m.	<b>Wed., Oct. 16</b>
Last day students may withdraw from a class	<b>Wed., Oct. 23</b>
<i>Schedule advising for Spring Semester:</i>	
	<b>Mon.-Fri., Nov. 11-15</b>
	<b>Mon.-Fri., Nov. 18-22</b>
<i>Advance registration for Spring Semester</i>	<b>Mon.-Fri., Nov. 18-22</b>
	<b>Mon.-Wed., Nov. 25-27</b>
	<b>Mon.-Wed., Dec. 2-4</b>
<i>Thanksgiving recess:</i>	
Classes recess, 5 p.m.	<b>Wed., Nov. 27</b>
Classes resume, 8 a.m.	<b>Mon., Dec. 2</b>
Last day of classes	<b>Wed., Dec. 11</b>
Study days	<b>Thur.-Fri., Dec. 12-13</b>
Final examinations	<b>Mon.-Fri., Dec. 16-20</b>
Semester ends	<b>Fri., Dec. 14</b>
Baccalaureate and Commencement	<b>Sat., Dec. 21</b>
Residence halls close	<b>Sat., Dec. 21</b>

## Spring Semester 2003

**January 9 through May 9**

Residence halls opening (tentative)	<b>Wed., Jan. 8</b>
Registration	<b>Thur.-Fri., Jan. 9-10</b>
First classes meet, 8 a.m.	<b>Mon., Jan. 13</b>
Last day for late registration, changing or adding courses	<b>Fri., Jan. 17</b>
Martin Luther King, Jr. Holiday	<b>Mon., Jan. 20</b>
Last day for semester-fee students (only) to drop below 12 hours and receive partial-tuition refund	<b>Fri., Jan. 17</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Fri., Jan. 17</b>
75% tuition refund	<b>Mon., Jan. 27</b>
50% tuition refund	<b>Mon., Feb. 3</b>
25% tuition refund. (No refunds after this date.)	<b>Mon., Feb. 10</b>
Last day for electing Pass/No Credit grading option	<b>Mon., Feb. 10</b>

Mid-semester reports of unsatisfactory work to Registrar, 9 a.m.

**Wed., Mar. 5**

*Spring recess:*

Classes recess, 10 p.m.

**Fri., Mar. 7**

Classes resume, 8 a.m.

**Mon., Mar. 17**

Last day students may withdraw from a class

**Wed., Mar. 19**

*Schedule advising for Summer Session and Fall Semester:*

**Mon.-Thur., Mar. 24-28**

**Mon.-Fri., Mar. 31 -Apr. 4**

**Mon.-Fri., Mar. 31-Apr. 4**

**Mon.-Fri., Apr. 7-11**

*Advance registration for Fall Semester:*

*Good Friday recess:*

Classes recess, 10 p.m.

**Thurs., Apr. 17**

Classes resume, 8 a.m.

**Mon., Apr. 21**

Last day of classes

**Wed., Apr. 30**

Study days

**Thur.-Fri., May 1-2**

Final examinations

**Mon.-Fri., May 5-9**

Baccalaureate and Commencement

**Sat., May 10**

Residence halls close

**Sat., May 10**

### **Summer Session 2003**

**May 12 through August 8**

Residence halls open

**Sun., May 11**

#### **Registration for Three Weeks Term (Term I)**

**Mon., May 12**

Classes begin

**Mon., May 12**

Late registration ends

**Tues., May 13**

*Last day to withdraw from class and receive:*

100% tuition refund

**Tues., May 13**

75% tuition refund

**Weds., May 14**

50% tuition refund

**Thur., May 15**

25% tuition refund (No refunds after this date.)

**Fri., May 16**

Last day for electing Pass/No Credit grading option

**Fri., May 16**

Last day students may withdraw from a class

**Wed., May 21**

Memorial Day Holiday

**Mon., May 26**

Last day of classes

**Fri., May 30**

#### **Registration for Eight Weeks Term (IE)**

**Mon., May 12**

Classes begin

**Mon., May 12**

Late registration ends

**Tues., May 13**

*Last day to withdraw and receive:*

100% tuition refund

**Fri., May 16**

75% tuition refund

**Mon., May 19**

50% tuition refund

**Tues., May 20**

25% tuition refund (No refunds after this date)

**Wed., May 21**

Last day for electing Pass/No Credit grading option

**Wed., May 21**

Memorial Day Holiday

**Mon., May 26**

Last day a student may withdraw from a class

**Fri., June 11**

Fourth of July Holiday

**Thur., July 3**

Last day of classes

**Fri., July 4**

#### **Registration for First Five Weeks Term (Term II)**

**Mon., June 2**

Classes begin

**Mon., June 2**

Late registration ends

**Tues., June 3**

*Last day to withdraw and receive:*

100% tuition refund

**Tues., June 3**

75% tuition refund

**Wed., June 4**

50% tuition refund

**Thur., June 5**

25% tuition refund (No refunds after this date)

**Fri., June 6**



Last day for electing Pass/No Credit	<b>Fri., June 6</b>
Last day students may withdraw from a class	<b>Wed., June 18</b>
Last day of classes	<b>Thur., July 3</b>
Fourth of July Holiday	<b>Fri., July 4</b>
<b>Registration for Second Five Weeks Term (Term III)</b>	<b>Mon., July 7</b>
Classes begin	<b>Mon., July 7</b>
Late registration ends	<b>Tues., July 8</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Tues., July 8</b>
75% tuition refund	<b>Wed., July 9</b>
50% tuition refund	<b>Thur., July 10</b>
25% tuition refund (No refunds after this date)	<b>Fri., July 11</b>
Last day for electing Pass/No Credit grading option	<b>Fri., July 11</b>
Last day students may withdraw from a class	<b>Wed., July 23</b>
Last day of classes	<b>Fri., Aug. 8</b>
Residence halls close	<b>Sat., Aug. 9</b>

**Fall Semester 2003****August 25 through December 19**

Residence halls opening (tentative)	<b>Sat., Aug. 23</b>
Registration	<b>Mon.-Tues., Aug. 25-26</b>
First classes meet, 8 a.m.	<b>Wed., Aug. 27</b>
Labor Day recess	<b>Mon., Sept. 1</b>
Last day for late registration, changing or adding courses	<b>Wed., Sept 3</b>
Last day for semester-fee students (only) to drop below 12 hours and receive partial-tuition refund	<b>Wed., Sept. 3</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Wed., Sept. 3</b>
75% tuition refund	<b>Wed., Sept. 10</b>
50% tuition refund	<b>Wed., Sept. 17</b>
25% tuition refund (No refunds after this date.)	<b>Wed., Sept. 24</b>
Last day for electing Pass/No Credit grading option	<b>Wed., Sept. 24</b>
<i>Mid-semester break:</i>	
Classes recess, 10 p.m.	<b>Thurs., Oct. 9</b>
Classes resume, 8 a.m.	<b>Mon., Oct. 13</b>
Mid-semester reports of unsatisfactory work to Registrar, 9 a.m.	<b>Wed., Oct. 15</b>
Last day students may withdraw from a class	<b>Wed., Oct. 22</b>
<i>Schedule advising for Spring Semester</i>	<b>Mon.-Fri., Nov. 10-14</b>
	<b>Mon.-Fri., Nov. 17-21</b>
<i>Advance registration for Spring Semester</i>	<b>Mon.-Fri., Nov. 17-21</b>
	<b>Mon.-Wed., Nov. 24-26</b>
	<b>Mon.-Wed., Dec. 1-3</b>
<i>Thanksgiving recess:</i>	
Classes recess, 5 p.m.	<b>Wed., Nov. 26</b>
Classes resume, 8 a.m.	<b>Mon., Dec. 1</b>
Last day of classes	<b>Wed., Dec. 10</b>
Study days	<b>Thur.-Fri., Dec. 11-12</b>
Final examinations	<b>Mon.-Fri., Dec. 15-19</b>
Semester ends	<b>Fri., Dec. 19</b>
Baccalaureate and Commencement	<b>Sat., Dec. 20</b>
Residence halls close	<b>Sat., Dec. 20</b>

**Spring Semester 2004****January 8 through May 7**

Residence halls opening (tentative)	<b>Wed., Jan. 7</b>
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Registration	<b>Thur.-Fri., Jan. 8-9</b>
First classes meet, 8 a.m.	<b>Mon., Jan. 12</b>
Last day for late registration, changing or adding courses	<b>Fri., Jan. 16</b>
Martin Luther King, Jr., Holiday	<b>Mon., Jan. 19</b>
Last day for semester-fee students (only) to drop below 12 hours and receive partial-tuition refund	<b>Fri., Jan. 16</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Fri., Jan. 16</b>
75% tuition refund	<b>Mon., Jan 26</b>
50% tuition refund	<b>Mon., Feb. 2</b>
25% tuition refund (No refunds after this date.)	<b>Mon., Feb. 9</b>
Last day for electing Pass/No Credit grading option	<b>Mon., Feb. 9</b>
Mid-semester reports of unsatisfactory work to Registrar, 9 a.m.	<b>Wed., Mar. 3</b>
<i>Spring recess:</i>	
Classes recess, 10 p.m.	<b>Fri., Mar. 5</b>
Classes resume, 8 a.m.	<b>Mon., Mar. 15</b>
Last day students may withdraw from a class	<b>Wed., Mar. 17</b>
<i>Schedule advising for Summer 2003 Session and Fall 2003 Semester</i>	
	<b>Mon.-Fri., Mar. 22-25</b>
	<b>Mon.-Fri., Mar. 29-Apr. 2</b>
<i>Advance registration for Fall Semester</i>	<b>Mon.-Fri., Mar. 29-Apr. 2</b>
	<b>Mon.-Thurs., Apr. 5-8</b>
	<b>Mon.-Tues., Apr. 12-13.</b>
<i>Good Friday recess:</i>	
Classes recess, 10 p.m.	<b>Thur., Apr. 8</b>
Classes resume, 8 a.m.	<b>Mon., Apr. 12</b>
Last day of classes	<b>Wed., Apr. 28</b>
Study days	<b>Thur.-Fri., May 1-2</b>
Final examinations	<b>Mon.-Fri., May 3-7</b>
Baccalaureate and Commencement	<b>Sat., May 8</b>
Residence halls close	<b>Sat., May 8</b>
<b>Summer Session 2004</b>	<b>May 10 through August 6</b>
Residence halls open	<b>Sun., May 9</b>
<b>Registration for Three Weeks Term (Term I)</b>	<b>Mon., May 10</b>
Classes begin	<b>Mon., May 10</b>
Late registration ends	<b>Tues., May 11</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Tues., May 11</b>
75% tuition refund	<b>Weds., May 12</b>
50% tuition refund	<b>Thur., May 13</b>
25% tuition refund (No refunds after this date.)	<b>Fri., May 14</b>
Last day for electing Pass/No Credit grading option	<b>Fri., May 14</b>
Last day students may withdraw from a class	<b>Wed., May 19</b>
Memorial Day Holiday	<b>Mon., May 28</b>
Last day of classes	<b>Fri., May 31</b>
<b>Registration for Eight Weeks Term (IE)</b>	<b>Mon., May 10</b>
Classes begin	<b>Mon., May 10</b>
Late registration ends	<b>Tues., May 11</b>
<i>Last day to withdraw and receive:</i>	
100% tuition refund	<b>Fri., May 14</b>
75% tuition refund	<b>Mon., May 17</b>
50% tuition refund	<b>Tues., May 18</b>
25% tuition refund (No refunds after this date)	<b>Wed., May 19</b>

Last day for electing Pass/No Credit grading option	<b>Wed., May 19</b>
Memorial Day Holiday	<b>Mon., May 31</b>
Last day a student may withdraw from a class	<b>Fri., June 4</b>
Fourth of July Holiday	<b>Thur., July 2</b>
Last day of classes	<b>Fri., July 5</b>
<b>Registration for First Five Weeks Term (Term II)</b>	<b>Mon., June 1</b>
Classes begin	<b>Mon., June 1</b>
Late registration ends	<b>Tues., June 2</b>
<i>Last day to withdraw and receive:</i>	
100% tuition refund	<b>Tues., June 2</b>
75% tuition refund	<b>Wed., June 3</b>
50% tuition refund	<b>Thur., June 4</b>
25% tuition refund (No refunds after this date)	<b>Fri., June 7</b>
Last day for electing Pass/No Credit	<b>Fri., June 7</b>
Last day students may withdraw from a class	<b>Wed., June 17</b>
Last day of classes	<b>Thur., July 2</b>
Fourth of July Holiday	<b>Fri., July 5</b>
<b>Registration for Second Five Weeks Term (Term III)</b>	<b>Mon., July 6</b>
Classes begin	<b>Mon., July 6</b>
Late registration ends	<b>Tues., July 7</b>
<i>Last day to withdraw from class and receive:</i>	
100% tuition refund	<b>Tues., July 7</b>
75% tuition refund	<b>Wed., July 8</b>
50% tuition refund	<b>Thur., July 9</b>
25% tuition refund (No refunds after this date)	<b>Fri., July 12</b>
Last day for electing Pass/No Credit grading option	<b>Fri., July 12</b>
Last day students may withdraw from a class	<b>Wed., July 22</b>
Last day of classes	<b>Fri., Aug. 6</b>
Residence halls close	<b>Sat., Aug. 7</b>

# Faculty Directory

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[AddRan College of Humanities and Social Sciences](#)

[M. J. Neeley School of Business](#)

[College of Communication](#)

[School of Education](#)

[College of Fine Arts](#)

[College of Health and Human Sciences](#)

[College of Science and Engineering](#)

## AddRan College of Humanities and Social Sciences

Mary L. Volcansek, Ph.D., Texas Tech, Dean

Michael R. Butler, Ph.D., North Carolina, Associate Dean

Don M. Coerver, Ph.D., Tulane, Associate Dean

## Design, Merchandising and Textiles

LARK F. CALDWELL, *Associate Professor*; Ph.D., Texas Woman's

JANACE E. BUBONIA-CLARKE, *Assistant Professor*; Ph.D., Texas Woman's

FREDERICK D. OBERKIRCHER III, *Associate Professor*; M.S., Pennsylvania State

JOSEPH SELF, *Assistant Professor*; M.Architecture, Rice

## Economics

CHARLES McVEY BECKER, *Associate Professor*; Ph.D., Arizona, C.F.A.

MICHAEL R. BUTLER, *Associate Professor and Associate Dean of AddRan College of Humanities and Social Sciences*; Ph.D., North Carolina

DAWN C. ELLIOTT, *Associate Professor*; Ph.D., New School for Social Research

JOHN TERENCE HARVEY, *Professor*; Ph.D., Tennessee

STEPHEN F. QUINN, *Associate Professor*; Ph.D., Illinois

## English

BONNIE BLACKWELL, *Assistant Professor*; Ph.D., Cornell

NEIL EASTERBROOK, *Associate Professor*; Ph.D., SUNY-Buffalo

RICHARD LEO ENOS, *Professor and Lillian Radford Chair of Rhetoric and Composition and Department Chair*; Ph.D., Indiana

BOB J FRYE, *Professor*; Ph.D., Tennessee

ANN GEORGE, *Assistant Professor*; Ph.D., Penn State

SHARON HARRIS, *Lorraine Sherley Professor of Literature*; Ph.D., Washington

CHARLOTTE HOGG, *Assistant Professor*; Ph.D., Nebraska

LINDA HUGHES, *Addie Levy Professor of Literature*; Ph.D., Missouri

CARRIE SHIVELY LEVERENZ, *Associate Professor and Director of Composition*; Ph.D., Ohio State

RONALD PITCOCK, *Assistant Professor*; Ph.D., Kentucky

STEPHEN D. POWELL, *Associate Professor*; Ph.D., Toronto

ALAN SHEPARD, *Professor*; Ph.D., Virginia

ELIZABETH SPILLER, *Associate Professor and Director of Graduate Studies*; Ph.D., Harvard

KAREN STEELE, *Assistant Professor*; Ph.D., Texas

AUSTRALIA TARVER, *Associate Professor and Director of Undergraduate Studies*; Ph.D., Iowa

DAVID VANDERWERKEN, *Professor*; Ph.D., Rice

## History

D. CLAYTON BROWN, *Professor and Chair*; Ph.D., UCLA

JAMES T. CHAMBERS, *Associate Professor*; Ph.D., Illinois

DON M. COERVER, *Professor and Associate Dean of AddRan College of Humanities and Social Sciences*; Ph.D., Tulane

MARK GILDERHUS, *Professor and Holder of the Lyndon Baines Johnson Chair of History*; Ph.D., Nebraska

TODD M. KERSTETTER, *Assistant Professor*; Ph.D., Nebraska

CLAIRE A. SANDERS, *Assistant Professor*; Ph.D., North Carolina

GENE A. SMITH, *Professor*; Ph.D., Auburn

SARA SOHMER, *Instructor*; Ph.D., Hawaii

KENNETH STEVENS, *Professor*; Ph.D., Indiana

RALPH LEE WOODWARD, *Professor and Holder of the Neville G. Penrose Chair of Latin American Studies*; Ph.D., Tulane

STEVEN E. WOODWORTH, *Associate Professor*; Ph.D., Rice

## Philosophy

SPENCER K. WERTZ, *Professor and Department Chair*; Ph.D., Oklahoma Political Science

## Political Science

RALPH G. CARTER, *Professor*; Ph.D., Ohio State

J. MICHAEL DODSON, *Professor*; Ph.D., Indiana

MANOCHEHR DORRAJ, *Associate Professor*; Ph.D., Texas

JAMES W. RIDDLESPERGER, JR., *Professor*; Ph.D., Missouri

### Religion

ANDREW O. FORT, *Professor*; Ph.D., Pennsylvania  
YUSHAU SODIQ, *Associate Professor*; Ph.D., Temple

### Sociology, Criminal Justice, and Anthropology

RONALD G. BURNS, *Assistant Professor*; Ph.D., Florida State  
JEAN GILES-SIMS, *Professor*; Ph.D., New Hampshire  
THOMAS GUDERJAN, *Assistant Professor of Anthropology*; Ph.D., Southern Methodist  
ANGEL ILARRAZA FUENTES, *Assistant Professor of Criminal Justice*; Ph.D., Bowling Green  
MICHAEL A. KATOVICH, *Professor*; Ph.D., Iowa  
MIGUEL C. LEATHAM, *Assistant Professor of Anthropology*; Ph.D., New Mexico  
CAROL THOMPSON, *Associate Professor and Chair*; Ph.D., Louisiana State  
MORRISON G. WONG, *Professor*; Ph.D., California-Riverside

### Spanish and Latin American Studies

LEE A. DANIEL, *Professor*; Ph.D., Texas Tech  
CAROLYN R. DURHAM, *Associate Professor*; Ph.D., Rutgers

### M. J. Neeley School of Business

Robert F. Lusch, Ph.D., Wisconsin; *Dean and Distinguished University Professor*  
William C. Moncrief, III, Ph.D., Louisiana State; *Senior Associate Dean and Charles F. and Alann P. Bedford Professor of International Business*  
Charles R. Greer, Ph.D., Kansas; *Associate Dean for Graduate Programs and Professor*  
Kristi Dill, M.B.A., Missouri; *Assistant Dean*  
Jack W. Jones, Ph.D., North Texas; *Vice Chair, Core Faculty Committee and Professor*  
Deborah Baker, M.B.A., TCU; *Director of the Charles Tandy American Enterprise Center*  
William Bigler, Ph.D., Louisiana State; *Executive Director of the Charles Tandy American Enterprise Center*  
Rebecca A. Beasley, Ph.D., Texas-Arlington; *MBA Academic Program Director*  
William D. Brown, M.B.A., TCU; *Assistant Director of the Graduate Programs Career Development Center*  
Denise Bynum, M.B.A., Texas; *Director of the Executive MBA Program*  
Amy Caster, MBA Texas-Dallas, *Career Specialist, Graduate Programs Career Development Center*  
Peggy W. Conway, M.B.A., TCU; *Director of MBA Admissions*  
Deborah B. Dewees, BA, Hollins College; *Director of the MBA Alumni Association*  
Charles Miller, B.B.A., Texas-El Paso; *Coordinator of Computer Support Services*  
David Minor, B.B.A., TCU; *Director of the James A. Ryffel Center for Entrepreneurial Studies*  
Mark Muller, B.B.A., SMU; *Assistant Director of the James A. Ryffel Center for Entrepreneurial Studies*  
Hoai Nguyen, B.A., TCU; *MBA Admissions Counselor*  
Nancy Nix, Ph.D., Tennessee; *Director of the Supply and Value Chain Center*  
Shirley S. Raspberry, M.B.A., TCU; *Director of the Graduate Programs Career Development Center*  
Kimberly K. See, M.E., Loyola of Chicago; *Coordinator of the Neeley Student Resource Center*  
Linda K. Smith, M.B.A., Oklahoma State; *Coordinator of External Relations*  
Peter C. Thompson, M.A., New Mexico; *Assistant Director of the Center for Professional Communication*  
Gay Wakefield, Ph.D., East Texas State; *Director of the Center for Professional Communication*  
Olivia Williams, M.B.A. Atlanta; *Assistant Director of MBA Admissions*

### Accounting

ARNOLD I. BARKMAN, *Associate Professor and Interim Chair*; Ph.D., Houston.  
SANDRA R. CALLAGHAN; *Assistant Professor*; Ph.D., Michigan State  
IN-MU HAW, *Professor*; Ph.D., Alabama  
STEVE LIM, *Associate Professor*; Ph.D., Pennsylvania  
DONALD R. NICHOLS, *Professor*; Ph.D., Oklahoma  
MARY HARRIS STANFORD, *Associate Professor*; Ph.D., Michigan  
ROBERT L. VIGELAND, *Professor*; Ph.D., Columbia  
MARCIA WEIDENMIER, *Assistant Professor*; Ph.D., Texas  
WILLIAM WEMPE, *Assistant Professor*; Ph.D., Texas A&M

### Finance and Decision Sciences

MAURICIO RODRIGUEZ, *Associate Professor and Chair*; Ph.D., Connecticut  
CHRISTOPHER B. BARRY, *Professor and Holder of the Robert L. and Maria Lowdon Chair in Business Administration*; D.B.A., Indiana  
STANLEY B. BLOCK, *Professor*; Ph.D., Louisiana State  
TERRY E. DIELMAN, *Professor*; Ph.D., Michigan  
JOSEPH B. LIPSCOMB, *Professor*; Ph.D., Houston  
LARRY J. LOCKWOOD, *C.R. Williams Professor of Financial Services*; Ph.D., Purdue  
STEVEN C. MANN, *Associate Professor*; Ph.D., Utah  
VASSIL MIHOV, *Assistant Professor*; Ph.D., Purdue  
RANGA V. RAMASESH, *Associate Professor*; Ph.D., Pennsylvania State  
ANDREW WAISBURD, *Assistant Professor*; Ph.D., Indiana

## Management

GREGORY K. STEPHENS, *Associate Professor and Chair*; Ph.D., California, Irvine  
 CHARLES E. BAMFORD, *Assistant Professor*; Ph.D., Tennessee  
 ROBERT BEATTY, *Assistant Professor of Electronic Business*; D.B.A., Mississippi State  
 GARRY D. BRUTON, *Associate Professor*; Ph.D., Oklahoma State  
 CHARLES R. GREER, *Associate Dean for Graduate Programs and Professor*; Ph.D., Kansas  
 JACK W. JONES, *Professor*; Ph.D., North Texas  
 DOROTHY LEIDNER, *Associate Professor of Electronic Business*; Ph.D., Texas  
 REBECCA A. LUCE, *Assistant Professor*; J.D., Akron; Ph.D., Michigan State  
 JANE M. MACKAY, *Director of Electronic Business and Associate Professor*; Ph.D., Texas  
 STEVEN MUELLER, *Assistant Professor*; Ph.D., Texas-Dallas  
 LAWRENCE H. PETERS, *Professor of Management*; Ph.D., Purdue  
 ROBERT T. RHODES, *Instructor*; J.D., Baylor; LL.M., Tulane  
 NEAL G. SHAW, *Assistant Professor of MIS*; Ph.D., Texas Tech  
 MEENU SINGH, *Assistant Professor*; Ph.D., Kentucky  
 CHARLES R. WILLIAMS, *Associate Professor*; Ph.D., Michigan State  
 STUART A. YOUNGBLOOD, *Professor*; Ph.D., Purdue

## Marketing

CHARLES W. LAMB, JR., *M. J. Neeley Professor of Marketing and Chair*; D.B.A., Kent State  
 REBECCA A. BEASLEY, *MBA Academic Program Director and Instructor*; Ph.D., Texas-Arlington  
 DAVID W. CRAVENS, *Professor and Holder of the Eunice and James L. West Chair of American Enterprise*; D.B.A., Indiana  
 DAVID W. FINN, *Assistant Professor*; Ph.D., Massachusetts  
 DIANA HAYTKO, *Assistant Professor*; Ph.D., Wisconsin  
 GEORGE S. LOW, *Associate Professor*; Ph.D., Colorado-Boulder  
 ROBERT F. LUSCH, *Dean and Distinguished University Professor*; Ph.D., Wisconsin  
 WILLIAM C. MONCRIEF III, *Senior Associate Dean and Charles F. and Alann P. Bedford Professor of International Business*; Ph.D., Louisiana State  
 SHANNON H. SHIPP, *Associate Professor*; Ph.D., Minnesota  
 ZACH G. ZACHARIA, *Assistant Professor*; Ph.D., Tennessee

## College of Communication

David E. Whillock, PhD, Arkansas, Interim Dean  
 Will Powers, PhD, Oklahoma, Interim Associate Dean

## Journalism

ANANTHA BABBILI, *Professor*. B.S. (Osmania U., India), 1971; B.J. (Ibid.), 1972; M.A. (Oklahoma), 1976; Ph.D. (Iowa), 1981. Since 1981.  
 SUZANNE HUFFMAN, *Associate Professor*. B.S. (TCU), 1973; M.A. (Iowa); Ph.D. (Missouri), 1992. Since 1999.  
 DOUGLAS ANN NEWSOM, *Professor and Director of Graduate Studies in Journalism*. B.J. (Texas-Austin), 1954; B.F.A. (Ibid.), 1955; M.J. (Ibid.), 1956; Ph.D. (Ibid.), 1978. Since 1969.  
 EARNEST L. PERRY Jr., *Assistant Professor*. B.S. (TCU), 1985; M.A. (Missouri), 1995; Ph.D. (Missouri), 1998  
 MAGGIE B. THOMAS, *Associate Professor*. . B.S. (Baylor), 1966; M.S. (Texas A&M), 1984; Ph.D. (Ibid.), 1988. Since 1991.  
 TOMMY G. THOMASON, *Associate Professor and Chairman of the Department*. B.A. (Ouachita), 1970; M.A. (Texas A&M-Commerce), 1972; Ed.D. (Ibid.), 1984. Since 1984.

## Radio-TV-Film

RICHARD J. ALLEN, *Associate Professor*. B.F.A. (New York U.), 1981; M.F.A. (Indiana), 1984. Since 1993.  
 ROGER COOPER, *Associate Professor and Chair of the Department*. B.S. (Arkansas State), 1983; M.S. (Ibid.), 1987; Ph.D. (Indiana), 1992. Since 1992.  
 RONALD ANDREW HASKETT, *Station Manager and University Instructional Staff*. B.S. (East Texas State), 1979; M.S. (TCU), 1982. Since 1985.  
 DEREK KOMPARE, *Assistant Professor*. B.A. (University of Arizona), 1990; M.A. (University of Wisconsin-Madison), 1994; Ph.D. (Ibid.). Since 1999.  
 CHARLES J. LaMENDOLA, *Instructor*. B.S. (Arkansas State), 1981; M.S. (Ibid.), 1988. Since 1994.  
 JOAN M. MCGETTIGAN, *Assistant Professor*. B.A. (Temple U.), 1981; M.A. (Penn State), 1985; Ph.D. (Penn State), 1994, Since 1997.  
 DAVID E. WHILLOCK, *Associate Professor*. B.A. (Hendrix College), 1976; M.A. (Arkansas), 1979; Ph.D. (Missouri), 1986. Since 1991.

## Speech Communication

RALPH R. BEHNKE, *Professor*. B.A. (Missouri-Kansas City), 1959; M.S. (Wisconsin), 1963; Ph.D. (Kansas), 1966. Since 1974.  
 MERRY BUCHANAN, *Instructor*. B. A. (University of Central Oklahoma), 1982; M.A. (University of Central Oklahoma), 1989; Ph.D. (University of Oklahoma), 2000. Since 2000.  
 PAUL E. KING, *Associate Professor*. B.S. (Hardin-Simmons), 1978; M.S. (TCU), 1980; Ph.D. (North Texas), 1985. Since 1980.

ANNE E. LUCCHETTI, *Assistant Professor*. B.A. (Albion College), 1989; M.S. (Purdue University), 1991; Ph.D. (University of Texas at Austin), 1998. Since 1999.  
 WILLIAM G. POWERS, *Professor and Chair of the Department*. B.S. (Illinois State), 1970; M.S., (Ibid.), 1971; Ph.D. (Oklahoma), 1973. Since 1996.  
 CHRIS R. SAWYER, *Assistant Professor*. B. A. (Houston Baptist University), 1976; M.S. (Texas Christian University), 1980; Ph.D. (University of North Texas) 1992. Since 1999.  
 MELISSA J. YOUNG, *Assistant Professor*. B.A. (SUNY), 1991; M.A. (Ibid.), 1993; Ph.D. (Ibid.), 1996. Since 1995.

### School of Education

Samuel M. Deitz, Ph.D., Florida; *Professor and Dean*  
 Sharon Reynolds, Ph.D., Texas Woman's University; *Director of Graduate Studies*

SUSAN ANDERSON, *Associate Professor*; Ed.D., Virginia  
 CATHY BLOCK, *Professor*; Ph.D., Wisconsin  
 LUTHER CLEGG, *Professor*; Ed.D., Texas Tech  
 TONIA FLORENCE-WALKER, *Assistant Professor*; Ed.D., Columbia  
 JUDITH GROULX, *Associate Professor*; Ph.D., TCU  
 JANET KELLY, *Associate Professor*; Ph.D., North Texas  
 NANCY MEADOWS, *Associate Professor*; Ed.D., Washington  
 ETTA MILLER, *Associate Professor*; Ed.D., SUNY-Albany  
 MARY PATTON, *Associate Professor*; Ph.D., Texas  
 SHARON REYNOLDS, *Professor*; Ph.D., Texas Woman's U.  
 DONAL SACKEN, *Professor*; Ph.D., Georgia State  
 CECILIA SILVA, *Associate Professor*; Ph.D., USC  
 RANAE STETSON, *Associate Professor*; Ed.D., Houston  
 KAY STEVENS, *Visiting Lecturer*; Ed.D., Kentucky  
 ELIZABETH TAYLOR, *Assistant Professor*; Ph.D., St. Mary's  
 CORNELL THOMAS, *Professor*; Ed.D., East Texas State  
 MOLLY WEINBURGH, *Associate Professor*; Ph.D., Emory

### College of Fine Arts

Scott A. Sullivan, Dean  
 Andie Piehl, Assistant to the Dean  
 H. Joseph Butler, Associate Dean and Director of Graduate Studies  
 Donna Smolik, Administrative Assistant to the Associate Dean and Director of Graduate Studies

### Art and Art History

BABBETTE BOHN, *Professor (Art History)*. B.A. (Northwestern), 1972; M.A. (Boston U.), 1975; M.Phil. (Columbia), 1978; Ph.D. (Ibid.), 1982. Since 1988.  
 DAVID CONN, *Professor (Printmaking, Drawing, Design)*. B.F.A. (Maryland Inst.), 1967; M.F.A. (Oklahoma), 1969. Since 1969.  
 LORI BOORNIAZIAN DIEL, *Assistant Professor (Art History)*. B.A. (Emory), 1992; M.A. (Tulane), 1996. Since 2001.  
 LEWIS A. GLASER, *Professor (Graphic Design)*. B.A. (Western Michigan), 1977; M.F.A. (Syracuse), 1988. Since 1987.  
 LINDA DEE GUY, *Associate Professor (Printmaking, Drawing)*. B.A. (South Florida), 1974; M.F.A. (Maryland Inst.), 1976. Since 1976.  
 SUSAN HARRINGTON, *Associate Professor (Drawing)*. B.F.A. (Maryland Institute College of Art), 1972; M.A. (Purdue), 1977; M.F.A. (North Texas), 1984. Since 1988.  
 ANNE HELMREICH, *Associate Professor (Art History)*. B.A. (Dickinson), 1985; M.A. (Pittsburgh), 1989; Ph.D. (Northwestern), 1994. Since 1996.  
 MICHAEL NIBLETT, *Assistant Professor (Graphic Design)*, B.F.A. (TCU), 1975; M.F.A. (Oklahoma), 1977. Since 1997.  
 LUTHER A. SMITH, JR., *Professor (Photography)*. B.A. (Illinois, Urbana-Champaign), 1972; M.F.A. (Rhode Island School of Design), 1974. Since 1983.  
 SCOTT A. SULLIVAN, *Professor and Dean of the College of Fine Arts*. B.A. (John Carroll U.), 1969; M.A. (Case Western Reserve U.), 1972; Ph.D., (Case Western Reserve U.), 1978. Since 2000.  
 MARK EDWARD THISTLETHWAITE, *Professor and Holder of the Kay and Velma Kimbell Chair of Art History*. B.A. (California - Santa Barbara), 1970; M.A. (Ibid.), 1972; Ph.D. (Pennsylvania), 1977. Since 1977.  
 RONALD WATSON, *Professor (Drawing and Painting) and Chair of the Department*. B.F.A. (Nebraska), 1964; M.F.A. (Ibid.), 1967. Since 1982.  
 JAMES WOODSON, *Professor (Painting, Drawing, Life Studies)*. B.F.A. (TCU), 1965; M.F.A. (Texas-Austin), 1967. Since 1974.

### Ballet and Modern Dance

FERNANDO BUJONES, *Choreographer-in-Residence*. American Ballet Theatre 1972-95. Gold medal for Highest Technical Achievement, Varna, Bulgaria 1974. International Guest Artist and Choreographer. Artistic Director of Ballet Mississippi (1993); Ballet Monterey, Mexico (1995); Orlando Ballet (2000).  
 LI-CHOU CHENG, *Ballet Master in Residence*. Former ballet master and soloist for the Beijing Central Ballet, and principal teacher for the Boston Ballet. Since 1990.  
 ELIZABETH GILLASPY, *Assistant Professor*. B.B.A. (Texas Tech), 1985. M.F.A. (TCU) 1990. Secondary Certification - Dance (TCU), 1995. Since 1990.  
 KEITHA DONNELLY MANNING, *Lecturer in Dance*, B.A. (Adelphi U.) 1971; M.A. (U. of North Texas), 1992; Ed.D. (Temple U.), 1996. Since 1998.  
 SUSAN DOUGLAS ROBERTS, *Associate Professor*. B.A. (TCU), 1979; B.F.A. (Ibid.), 1980; M.F.A. (Illinois), 1983.

Since 1984.  
ELLEN PAGE SHELTON, *Associate Professor and Chair of the Department*. B.F.A. (TCU), 1971. M.F.A. (Ibid.), 1978.  
Since 1973.

## Music

SHEILA M. ALLEN, *Associate Professor of Voice*. B.M. (Oberlin Conservatory), 1966; M.M. (Eastman, Rochester), 1967; D.M.A. (Ibid.), 1974. Since 1985.  
DAVID BROCK, *Assistant Professor of Voice*. B.A. (Abilene Christian University), 1974; M.M. (New England Conservatory of Music), 1978. Since 2002.  
JON BURGESS, *Assistant Professor of Trumpet*. B.M. (Illinois), 1978; M.M. (Kansas), 1980; D.M.A. (Arizona) 1988. Since 2000.  
H. JOSEPH BUTLER, *Associate Professor; University Organist; Associate Dean and Director of Graduate Studies of the College of Fine Arts*. B.A. (Bowdoin), 1976; M.M. (New England Conservatory), 1978; D.M.A. (Eastman), 1985. Since 1996.  
RICHARD ESTES, *Associate Professor and Director of Opera Theatre*. B.M. (Stetson), 1970; M.M. (Catholic U.), 1974. Since 1992.  
JOSE FEGHALI, *Artist-in-Residence*. Graduate of the Royal Academy of Music in London; Grand Prize Winner, Van Cliburn International Piano Competition, 1985. Since 1990.  
BLAISE J. FERRANDINO, *Associate Professor of Music Theory and Composition*. B.M. (Ithaca College), 1980; M.M. (Syracuse), 1982; D.M.A. (Hartford), 1990. Since 1990.  
BOBBY R. FRANCIS, *Assistant Professor of Music and Director of Bands*. B.M.E. (Commerce), 1981; M.M.E. (Commerce), 1989. Since 2000.  
GERALD R. GABEL, *Associate Professor of Music Theory and Composition*. B.M. (Northern Iowa), 1974; M.A. (California - San Diego), 1977; Ph.D. (Ibid.), 1984. Since 1987.  
MISHA GALAGANOV, *Assistant Professor of Viola*. B.M. (Jerusalem), 1994; Artist Certificate (SMU), 1996; M.M. (Rice), 1998. Since 2000.  
ROBERT GARWELL, *Professor of Music*. B.F.A. (Ohio U.), 1965; M.F.A. (Ibid.), 1967; D.M.A. (Oklahoma), 1977. Since 1989.  
RICHARD C. GIPSON, *Director*. A.A. (Del Mar College), 1969; B.M. (University of Texas at Austin), 1971; M.M. (University of Texas at Austin), 1973; D.Ed./Music Education (Pennsylvania State University), 1978. Since 2002.  
JOHN READ GIORDANO, *Associate Professor*. B.M.E. (TCU), 1960; M.M. (Ibid.), 1962; Diploma Superieure (Conservatoire Royal de Musique, Brussels), 1965. Musical Director and Conductor of the Fort Worth Symphony Orchestra. Since 1973.  
GERMÁN AUGUSTO GUTIÉRREZ, *Assistant Professor/Director of Orchestral Studies and Director of the Center for Latin American Music*. Maestro en Musica (Tolima Conservatory), 1978; M.M. (Illinois), 1991; D.A. (University of Northern Colorado), 1997. Since 1996.  
LEANNE HEDGES KIRKHAM, *Director of Music Preparatory Program and Instructor in Piano*. B.M. (TCU), 1978; M.M. (Ibid.), 1981. Since 1981.  
MICHAEL MECKNA, *Professor of Musicology*. B.A. (California State), 1978; Ph.D. (California), 1984. Since 1990.  
SHERI NEILL, *Assistant Professor of Music Education*. M.M.E. (Texas Tech), 1970; M.Ed. (Stephen F. Austin University), 1983; Ph.D. (University of Missouri-Kansas City), 1998. Since 2001.  
JOHN OWINGS, *Herndon Professor of Piano*. B.M. (UT-Austin), 1965; M.S. (Juilliard), 1970. Since 1990.  
JANET W. PUMMILL, *Staff Accompanist*. B.M. (North Texas), 1964; M.M. (Illinois), 1968. Since 1992.  
RONALD L. SHIREY, *Professor of Choral Music*. B.M. (Tulsa), 1955; M.M. (Ibid.), 1961. Since 1976.  
JUDITH A. SOLOMON, *Associate Professor of Piano*. B.A. (Rutgers), 1965; M. Mus. (Yale), 1968. Since 1968.  
CURT THOMPSON, *Assistant Professor of Violin*. B.M. (Indiana), 1992; M.M. (Indiana), 1994; Ph.D. (Rice), 1997. Since 1997.  
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