

COLLEGE OF ENGINEERING

Graduate Programs

The objectives of graduate study are to develop a student's capacity to solve problems and learn independently, to familiarize the student with past and current research in a particular field, and to enable the student to conduct research and relate it to published research, other scholarly investigations, and disciplinary principles and theories.

Graduate studies differ from undergraduate studies in that graduate students must demonstrate even more responsibility and initiative in acquiring the knowledge, methods, and skills needed to achieve success in their chosen disciplines. Graduate students must read both extensively and intensively. They must conduct original scholarly work, think creatively and productively, and participate in activities which help develop scholarly commitment and stimulate continued intellectual growth.

The College of Engineering offers the graduate degrees listed above. In addition, the College offers graduate coursework in the following disciplines:

Engineering Technology
Geographic Information Science

Centers for Research and Continuing Education

Research units within or related to the College of Science and Engineering provide further opportunities for graduate student research. These units include the Harte Research Institute for Gulf of Mexico Studies, the Center for Coastal Studies, the Conrad Blucher Institute for Surveying and Science, the Center for Water Supply Studies, the National Spill Control School, and the Center for Information Assurance, Statistics, and Quality Control. See the Research Resources section of this catalog for further information.

Admission to Graduate Programs

Consult the Admissions section of this catalog for university requirements for admission and graduate degrees. Students seeking admission to the Doctor of Philosophy program with a major in Geospatial Computer Science or the Master of Science program with a major in Computer Science, or Geospatial Systems Engineering, must submit completed applications through the Office of Admissions. The Office of Admissions indicates the specific dates that applications should be complete for acceptance to the summer, fall, or spring semester, respectively. A complete application to a graduate degree program within the College of Science and Engineering consists of the completed application form, GRE scores if required by the program, complete transcripts, and other information or documentation as required by the specific degree program. Additional requirements exist for international students. Consult the section of the graduate catalog pertaining to the degree program of interest for specific admission requirements.

Degree Program Admission Procedure

The Office of Recruitment and Admissions compiles all applications for graduate degree programs, and then forwards the application materials of eligible students to the College of Engineering for further forwarding to the Graduate Selection Committee of the specific degree program. The committee, usually composed of faculty from the discipline, will review

the applications, make judgments concerning the acceptance or rejection of applicants, and assign graduate advisers.

An application procedure is necessary because only a limited number of students can be accepted to graduate study in any semester based upon limitations in both faculty and facility resources. When there are more qualified applicants than can be instructed adequately, students may be delayed in their acceptance to the degree program even though they have met all requirements.

An incoming student is expected to know fundamental concepts in the relevant discipline. The student, therefore, may be required to make up deficiencies in fundamentals by enrolling in appropriate foundation courses. In some cases admission may be delayed until an applicant has completed each foundation course with a "B" or better grade. In no case will a foundation course count towards the total number of hours required for the Doctor of Philosophy or Master of Science degree.

Graduate Orientation

All students seeking graduate degrees in the College of Engineering must attend the graduate student orientation to be held by the University in conjunction with the College of Graduate Studies, the College of Engineering and the program of their major near the beginning of their first semester of coursework at Texas A&M University–Corpus Christi.

Residency Requirement

Each degree program within the College of Engineering has a minimum enrollment requirement for degree candidates. Refer to the description of the specific degree program for details.

Reinstatement After Enforced Withdrawal

Students on enforced withdrawal may not re-enroll in graduate studies in the College of Engineering until after a period of 12 consecutive months. Refer to university section of catalog on "Scholastic Probation and Enforced Withdrawal" for additional details.

Graduate Courses

General prerequisite for 5000-level and 6000-level courses: Graduate standing. Senior undergraduates in their last semester or summer session of undergraduate work may take 5000-level courses provided that they have a cumulative grade point average of 3.0 or better, and that written approval is obtained from the Dean of the college in which the work is offered. For other conditions that may apply, see "Graduate Study by Undergraduates" in the section of the catalog entitled "Graduate Academic and Degree Requirements."

With the exception of courses offered by those masters degree programs that require graduate leveling, students may take no more than nine graduate hours in the College of Engineering unless they are accepted into a graduate degree program within the College of Engineering. Students accepted into graduate programs in other colleges of the University may not take courses in the College of Engineering unless those courses are specified in the degree plan. Non-degree seeking students may take no more than one semester of courses in the College of Engineering. In any case, the total number of courses taken within the College of Science and Engineering by students who are not yet accepted into a degree program in the College of Engineering may not exceed nine hours.

Weekly lecture and laboratory hours associated with each course are designated by (lecture: lab) following the semester hours in the catalog course listing.

Directed Independent Study (DIS)

Each area of the College offers courses in directed independent study. These courses appear with a 5X96 number ("X" ranges from 1-6 semester hours) in the course offerings of each discipline and may carry variable credit depending upon the course design. The number of credit hours must be approved by the instructor, the Department Chairperson/Director, and the Dean in advance of registration. These courses may be repeated to total no more than six semester credit hours.

Final Oral Examination

Requirements for a final oral examination may be found in the catalog section on the specific degree specialty. See the degree requirements for the particular program.

Approval of Thesis, Project Report or Professional Paper

The graduate thesis, project report, or professional paper must be prepared in a style and format that is prescribed by the specific degree program. Copies of the signed thesis, project report, or professional paper must be submitted to the Office of the Dean of the College of Engineering on or before the last day of classes for the Dean's approval and signature (the specific number of copies will be designated by the College). The Dean's Office will be responsible for distributing the copies to the appropriate offices. The student must pay for binding of the dissertation or thesis, if required. Thesis formatting and submission requirements have changed. Please visit the following link for further information: http://gradschool.tamucc.edu/current_students/doctoral_dissertation.html.

Approval of Dissertation

The process required for approval of the dissertation is described in the Geospatial Computer Science Doctor of Philosophy section.

Programs

- Doctoral Degree Programs (<http://catalog.tamucc.edu/graduate/engineering/doctoral/>)
 - Geospatial Computer Science, PhD (<http://catalog.tamucc.edu/graduate/engineering/doctoral/geospatial-computer-science-phd/>)
- Master Degree Programs (<http://catalog.tamucc.edu/graduate/engineering/masters/>)
 - Computer Science, MS (<http://catalog.tamucc.edu/graduate/engineering/masters/computer-science-ms/>)
 - Geospatial Systems Engineering, MS (<http://catalog.tamucc.edu/graduate/engineering/masters/geospatial-systems-engineering-ms/>)