

## Department of Mathematics

### Faculty

- Keith Rogers, Ed.D., Chair
- Ashley Cherry, Ph.D.
- Brian Fisher, Ph.D.
- David Joyner, M.A.
- Ann Sims, M.A.

### Degrees

To earn a degree, students must complete the curriculum and meet other requirements for a degree listed in the academic policy section of this catalog.

- [Bachelor of Arts in Mathematics](#)
- [Bachelor of Science in Mathematics](#)
- [Bachelor of Arts in Mathematics with Emphasis in Pre-Engineering](#)

### Bachelor of Arts in Mathematics

#### A. University Core (47 hours)

- BIB1310 Introduction to the Old Testament
- BIB1320 Introduction to the New Testament
- BIB3305 Christian Heritage
- BIB3310 Christian Life
- COM2340 Communication for the Professional
- ENG1301 Composition Studies
- ENG1302 Composition and Literature
- 3 hours from
  - PSY1300 General Psychology
  - SOC1300 General Sociology
- 3 hours from HIS
- 3 hours from ECO, FIN, GOV, or HIS
- ESS1200 Personal Fitness and Wellness
- UNI1170 University Seminar
- MAT1402 Analytical Geometry and Calculus I
- 4 hours from
  - BIO1405 Majors Biology I
  - CHE1307 General Chemistry I
  - CHE1107 General Chemistry I Lab
- 6 hours from AFA, Arts History, ENG, GOV, HIS, PHI, REL, FOL, or BIL
- UNI2000 University Skills

#### B. Major (32 hours)

- MAT1403 Analytical Geometry and Calculus II
- MAT2404 Analytical Geometry and Calculus III
- MAT3303 Probability and Statistics
- MAT3305 Foundations of Mathematics I
- MAT3306 Differential Equations
- MAT3350 Linear Algebra
- MAT3351 Intermediate Analysis
- MAT3353 Numerical Analysis
- MAT4351 Modern Algebra
- 3 hours from upper level MAT

#### C. Supporting Courses (28 hours)

- 1 hour from ESS Activity Course

- IST2300 Microcomputer Applications
- IST3300 Advanced Spreadsheet Design
- ENG3308 Technical Writing
- 4 hours from
  - BIO1406 Majors Biology II
  - CHE1308 General Chemistry II
  - CHE1108 General Chemistry II Lab
- 3 hours from upper level ENG or HIS
- PHY1303 General Physics I
- PHY1103 General Physics I Lab
- PHY1304 General Physics II
- PHY1104 General Physics II Lab
- GOV2302 Texas State and Local Government

D. Electives (15 hours)

E. Total (122 hours)

### **Bachelor of Science in Mathematics**

A. University Core (47 hours)

- BIB1310 Introduction to the Old Testament
- BIB1320 Introduction to the New Testament
- BIB3305 Christian Heritage
- BIB3310 Christian Life
- COM2340 Communication for the Professional
- UNI1170 University Seminar
- ENG1301 Composition Studies
- ENG1302 Composition and Literature
- 3 hours from
  - PSY1300 General Psychology
  - SOC1300 General Sociology
- 3 hours from HIS
- 3 hours from ECO, FIN, GOV, or HIS
- ESS1200 Personal Fitness and Wellness
- MAT1402 Analytical Geometry and Calculus I
- 4 hours from
  - BIO1405 Majors Biology I
  - CHE1307 General Chemistry I
  - CHE1107 General Chemistry I Lab
- 6 hours from AFA, Arts History, ENG, GOV, HIS, PHI, REL, FOL, or BIL
- UNI2000 University Skills

B. Major (32 hours)

- MAT1403 Analytical Geometry and Calculus II
- MAT2404 Analytical Geometry and Calculus III
- MAT3303 Probability and Statistics
- MAT3305 Foundations of Mathematics I
- MAT3306 Differential Equations
- MAT3350 Linear Algebra
- MAT3351 Intermediate Analysis
- MAT3353 Numerical Analysis
- MAT4351 Modern Algebra
- 3 hours in upper level MAT

C. Supporting Courses (31 hours)

- 1 hour from ESS Activity Courses

- 4 hours from
  - BIO1406 Majors Biology II
  - CHE1308 General Chemistry II
  - CHE1108 General Chemistry II Lab
- 6 hours upper level CHE
- IST2300 Microcomputer Applications
- IST3300 Advanced Spreadsheet Design
- ENG3308 Technical Writing
- ENG3310 Grant Writing
- PHY1303 General Physics I
- PHY1103 General Physics I Lab
- PHY1304 General Physics II
- PHY1104 General Physics II Lab

D. Electives (12 hours)

E. Total (122 hours)

### **Educator Certification in Mathematics**

Students planning to certify to teach are required to take the following courses in addition to the Bachelor of Arts or Science requirements outlined above. Refer to the educator certification section of this catalog for other requirements.

Pedagogy and Professional Responsibility (6 hours)

- 3 hours from
  - EDS2310 Foundations of Education
  - EDS2320 Instructional Technology
  - EEL2310 Teachers, Schools, and Society
- ESP3382 The Exceptional Child

Methods Block (9 hours)

- 3 hours from
  - EDS4340 Reading/Writing/Thinking in Secondary and Middle School
  - REA3340 Reading Writing Connection
  - REA4350 Practical Applications to Reading
- EDS4330 Managing Diverse Classrooms
- EDS4350 Design and Delivery

Clinical Teaching Block (12 hours)

- EDS4310 Assessment and Evaluation
- EDS4360 Seminar in Education
- EDS4660 Student Teaching

### **Bachelor of Arts in Mathematics with an Emphasis in Pre-Engineering**

The university is part of a cooperative program that enables its students to earn a BA in Mathematics with an emphasis in pre-engineering and a BS in Engineering from Texas Tech University (TTU) or West Texas A&M University (WTAMU). The first five semesters are taken at Lubbock Christian University and the remaining semesters are taken at one of the partnership universities. The BS in Engineering from TTU or WTAMU must first be earned to apply for the Lubbock Christian University degree.

During the second year at Lubbock Christian University, students must apply for and obtain admission to the TTU or WTAMU engineering programs. Other courses may be advised by TTU or WTAMU when a field of engineering is selected. Deviations or substitutions must be approved by the program coordinator at Lubbock Christian University.

A. University Core (41 hours)

- BIB1310 Introduction to the Old Testament

- BIB1320 Introduction to the New Testament
- COM2340 Communication for the Professional
- ENG1301 Composition Studies
- ENG1302 Composition and Literature
- 3 hours from
  - PSY1300 General Psychology
  - SOC1300 General Sociology
- 3 hours from HIS
- 3 hours from ECO, FIN, GOV, or HIS
- ESS1200 Personal Fitness and Wellness
- UNI1170 University Seminar
- MAT1402 Analytical Geometry and Calculus I
- CHE1307 General Chemistry I
- CHE1107 General Chemistry I Lab
- 6 hours from AFA, Arts History, ENG, GOV, HIS, PHI, REL, FOL, or BIL
- UNI2000 University Skills

## B. Major (20 hours)

- MAT1403 Analytical Geometry and Calculus II
- MAT2404 Analytical Geometry and Calculus III
- MAT3303 Probability and Statistics
- MAT3306 Differential Equations
- MAT3350 Linear Algebra
- 3 hours from upper level MAT

## C. Emphasis (24 hours)

- CHE1308 General Chemistry II
- CHE1108 General Chemistry II Lab
- GOV2302 Texas State and Local Government
- IST1350 Programming and Logic
- 3 hours from
  - MAT1312 Trigonometry
  - MAT1313 Pre-Calculus
- PHI3305 Ethics
- PHY2301 Engineering Physics I
- PHY2101 Engineering Physics I Lab
- PHY2302 Engineering Physics II
- PHY2102 Engineering Physics II Lab

## D. Electives (35 hours from engineering programs at TTU or WTAMU, 24 hours upper level)

## E. Total (120 hours)

**Minor in Mathematics**

(20 hours)

- MAT 1313 Pre-Calculus Mathematics
- MAT 1402 Analytical Geometry and Calculus I
- MAT 1403 Analytical Geometry and Calculus II
- 9 hours from
  - MAT 2404 Analytical Geometry and Calculus III
  - MAT 3303 Probability and Statistics
  - MAT 3305 Foundations of Mathematics I
  - MAT 3306 Differential Equations
  - MAT 3350 Linear Algebra
  - MAT 3353 Numerical Analysis