Actuarial Science, BS

Academic Plans

Four-Year Graduation Plan

The following checkpoints list the minimum requirements students must complete by certain semesters in order to stay on the university's Four-Year Graduation Plan. Courses in the major are those required to complete the major; they may be offered by departments other than the major department.

Much of the coursework is sequential, so students must begin requirements for the major as soon as possible. Individual study plans must be made carefully. Students who first enroll for a spring semester must consult their advisor to confirm a four-year plan.

Before the third semester begins:
- MATH:1860 Calculus II
- MATH:2700 Introduction to Linear Algebra

Before the fifth semester begins:
- MATH:2850 Calculus III
- STAT:3100/IGPI:3100 Introduction to Mathematical Statistics I
- STAT:3101/IGPI:3101 Introduction to Mathematical Statistics II
- ACTS:3080 Mathematics of Finance I

Before the seventh semester begins:
- STAT:4101/IGPI:4101 Mathematical Statistics II
- ACTS:4130 Quantitative Methods for Actuaries
- ACTS:4150 Fundamentals of Short-Term Actuarial Mathematics
- ACTS:4180 Life Contingencies I
- At least 90 s.h. earned toward the degree

Before the eighth semester begins:
- ACTS:4280 Life Contingencies II

During the eighth semester:
- Enrollment in all remaining coursework in the major, all remaining GE CLAS Core courses, and a sufficient number of semester hours to graduate.

Sample Plan of Study

Sample plans represent one way to complete a program of study. Actual course selection and sequence will vary and should be discussed with an academic advisor. For additional sample plans, see MyUI.

Actuarial Science, BS

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>Academic Career</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Any Semester</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students apply to the Actuarial Science BS program through a selective process. Acceptance is not guaranteed.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>GE CLAS Core: Sustainability</td>
<td></td>
<td></td>
</tr>
<tr>
<td>First Year</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fall</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CS:1210</td>
<td>Computer Science I: Fundamentals</td>
<td>4</td>
</tr>
<tr>
<td>MATH:1850</td>
<td>Calculus I</td>
<td>4</td>
</tr>
<tr>
<td>ENGL:1200</td>
<td>The Interpretation of Literature or Rhetoric</td>
<td>3 - 4</td>
</tr>
<tr>
<td>GE CLAS Core: World Languages First Level Proficiency or elective course</td>
<td>4 - 5</td>
<td></td>
</tr>
</tbody>
</table>

Hours: 0

Spring

- MATH:1860 Calculus II
- MATH:2700 Introduction to Linear Algebra
- GE CLAS Core: Diversity and Inclusion
- GE CLAS Core: World Languages Second Level Proficiency or elective course

Hours: 15-16

Second Year

Fall

- MATH:2850 Calculus III
- STAT:3100 Introduction to Mathematical Statistics I
- ENGL:1200 The Interpretation of Literature or RHET:1030 Rhetoric
- GE CLAS Core: Natural Sciences without Lab
- GE CLAS Core: World Languages Third Level Proficiency or elective course
- Admission Application: apply to the Actuarial Science BS major

Hours: 17-19

Spring

- ACTS:3080 Mathematics of Finance I
- MATH:3770 Fundamental Properties of Spaces and Functions I
- STAT:3101 Introduction to Mathematical Statistics II
- GE CLAS Core: World Languages Fourth Level Proficiency or elective course

Hours: 14-15

Third Year

Any Semester

The curriculum shown in the third and fourth years on this plan begins upon acceptance into the Actuarial Science BS program.

Hours: 0

Fall

- ACTS:4130 Quantitative Methods for Actuaries
- STAT:4100 Mathematical Statistics I
- GE CLAS Core: Natural Sciences with Lab
- GE CLAS Core: Social Sciences
- Elective course

Hours: 3

Attend the Actuarial Science, Insurance and Risk Management Job Fair during the fall semester to apply for summer internships.

Spring

- ACTS:4150 Fundamentals of Short-Term Actuarial Mathematics
- ACTS:4180 Life Contingencies I
- STAT:4101 Mathematical Statistics II

Hours: 3
| GE CLAS Core: Historical Perspectives | 3 |
| GE CLAS Core: Literary, Visual, and Performing Arts | 3 |

### Fourth Year

#### Fall

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACTS:4280</td>
<td>Life Contingencies</td>
<td>3</td>
</tr>
<tr>
<td>STAT:4560</td>
<td>Statistics for Risk Modeling I</td>
<td>3</td>
</tr>
<tr>
<td>GE CLAS Core: International and Global Issues</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Elective course</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Elective course</td>
<td>3</td>
<td></td>
</tr>
</tbody>
</table>

Attend the Actuarial Science, Insurance and Risk Management Job Fair during the fall semester.

#### Hours 15

#### Spring

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACTS:6200</td>
<td>Predictive Analytics</td>
<td>3</td>
</tr>
<tr>
<td>STAT:4561</td>
<td>Statistics for Risk Modeling II</td>
<td>3</td>
</tr>
<tr>
<td>GE CLAS Core: Values and Culture</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Elective course</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Elective course</td>
<td>3</td>
<td></td>
</tr>
</tbody>
</table>

Degree Application: apply on MyUI before deadline (typically in February for spring, September for fall)

#### Hours 15

#### Total Hours 123-129