



ACTUARIAL SCIENCE

Academics

As a major in actuarial science, you will study problem solving related to financial security, with a focus on the understanding of additional considerations in practical applications of actuarial theory such as assumption setting, actuarial standards of practice, the professional code of conduct and effective communication. Core classes include a complete calculus sequence as well as courses in statistics and probability.

Experience

In the College of Arts and Sciences, we know experience is valuable and goes beyond the classroom. We strive to help you connect your academics with research, internships, education abroad, service learning and leadership experiences. Take advantage of opportunities in actuarial science such as:

- Joining the Actuarial Science Club and running for office like the treasurer or club president
- Interning for Allstate Financial, Blue Cross Blue Shield, Mutual of Omaha, Ameritas Life Insurance or many more
- Travelling abroad and studying in Brazil, China, England, Italy or a destination that matches your interests
- Volunteering with the Center for Civic Engagement
- Researching actuarial standards of practice

Opportunities

As an actuarial science major, you will use your skills to design, price and value financial security systems such as insurance and retirement plans. A creative aspect of actuarial work lies in the forecasting of events. Actuaries are frequently called upon to make decisions that affect the fiscal soundness of financial security programs well into the future. Nebraska graduates have obtained jobs in the field throughout the United States and beyond. Here are examples of recent graduates' employment:

- Actual Technician / **ROCKHILL INSURANCE**
- Actuarial Assistant / **MILLIMAN CONSULTING**
- Actuarial Development Program / **LINCOLN FINANCIAL GROUP**
- Associate Actuarial Analyst / **COVENTRY HEALTH CARE**
- Executive Actuarial Analyst / **PACIFIC ORIENT INSURANCE CO. BERHAD**
- Statistician / **USDA**
- Trainee Actuary / **KPMG**
- Value Chain Analyst / **ATS SECURED**



ACTUARIAL SCIENCE

ACE = Achievement-Centered Education

CDR = College Distribution Requirements

FIRST SEMESTER

MATH 106: Calculus I (ACE 3)	5
CDR: Human Diversity in U.S. Communities	3
Written Texts / Research & Knowledge Skills (ACE 1)	3
CDR: Language	5
Total Hours	16

SECOND SEMESTER

MATH 107: Calculus II	4
ECON 211: Principles of Macroeconomics (ACE 6)	3
Humanities (ACE 5)	3
CDR: Language	5
Total Hours	15

THIRD SEMESTER

MATH 208: Calculus III	4
ACTS 440: Interest Theory	4
CDR: Written Communication	3
CDR: Language	3
Total Hours	14

FOURTH SEMESTER

STAT 380: Statistics & Applications	3
ACTS 441: Introduction to Financial Economics	3
FINA 338: Principles of Individual and Corporate Risk Management	3
COMM 286 or MRKT 257 (ACE 2)	3
CDR: Language	3
Total Hours	15

FIFTH SEMESTER

STAT 462: Introduction to Mathematical Statistics I: Distribution Theory	4
ACTS 95: Actuarial Practicum	0
Scientific Methods & Knowledge of Natural / Physical World (ACE 4)	3
Ethical Principles (ACE 8)	3
Elective / Minor / Secondary Major / Science / Pre-Professional	3
Elective / Minor / Secondary Major / Science / Pre-Professional	3
Total Hours	16

SIXTH SEMESTER

ACTS 470: Life Contingencies I	3
STAT 463: Introduction to Mathematical Statistics II: Statistical Inference	3
CDR: Humanities	3
CDR: Social Science	3
Elective / Minor / Secondary Major / Science / Pre-Professional	3
Total Hours	15

SEVENTH SEMESTER

ACTS 471: Life Contingencies II	3
ACTS 473: Introduction to Risk Theory	3
Fine Arts (ACE 7)	3
CDR: Natural, Physical, and Mathematical Sciences with Lab	4
Elective / Minor / Secondary Major / Science / Pre-Professional	2
Total Hours	15

EIGHTH SEMESTER

ACTS 475: Actuarial Applications in Practice (ACE 10)	3
ACTS 474: Introduction to Property / Casualty Actuarial Science	3
ECON 321: Intro to International Economics (ACE 9)	3
Elective / Minor / Secondary Major / Science / Pre-Professional	3
Elective / Minor / Secondary Major / Science / Pre-Professional	3
Total Hours	15

***DISCLAIMER:** This document represents a sample 4-year plan for degree completion with a major of interest in the College of Arts and Sciences. Actual course selection and sequence may vary and should be discussed individually with an academic advisor at the college and department level.