Twin Cities Campus

Statistics Minor

Statistics, School of

College of Liberal Arts

Link to a list of faculty for this program.

Contact Information:
School of Statistics, 313 Ford Hall, 224 Church Street SE, Minneapolis, MN 55455 (612-625-8046; fax: 612-624-8868)
Email: info@stat.umn.edu
Website: https://cla.umn.edu/statistics/undergraduate/majors-minors/undergraduate-minor-statistics

- Program Type: Graduate minor related to major
- Requirements for this program are current for Fall 2022
- Length of program in credits (Masters): 9
- Length of program in credits (Doctorate): 14
- This program does not require summer semesters for timely completion.

Along with the program-specific requirements listed below, please read the General Information section of the catalog website for requirements that apply to all major fields.

The School of Statistics is the primary venue at the University for research, teaching, and dissemination of the theory, methodology, and applications of statistical procedures. Students may specialize in any area of statistics. The core program for all students has strong components of both theoretical and applied statistics.

Program Delivery

This program is available:

- via classroom (the majority of instruction is face-to-face)

Prerequisites for Admission

Special Application Requirements:
Students interested in the minor are strongly encouraged to confer with their major field advisor and director of graduate studies, and the Statistics director of graduate studies regarding feasibility and requirements.

International applicants must submit score(s) from one of the following tests:

- TOEFL
  - Internet Based - Total Score: 79

Key to test abbreviations(TOEFL).

For an online application or for more information about graduate education admissions, see the General Information section of the catalog website.

Program Requirements

Use of 4xxx courses toward program requirements is permitted under certain conditions with adviser approval.

Courses offered on both the A-F and S/N grading basis must be taken A-F, with a minimum grade of B- earned for each, unless otherwise approved by the Statistics director of graduate studies.

Doctoral students cannot apply 4-level courses or STAT 5021 to the minor.

The minimum cumulative GPA for minor field coursework is 2.80.

Coursework (9 to 14 credits)
Masters students select 9 credits, and doctoral students select 14 credits from the following in consultation with their advisor and the Statistics director of graduate studies.
STAT 4051 - Statistical Machine Learning I (4.0 cr)
STAT 4052 - Statistical Machine Learning II (4.0 cr)

STAT 4101 - Theory of Statistics I (4.0 cr)
STAT 4102 - Theory of Statistics II (4.0 cr)
STAT 5021 - Statistical Analysis (4.0 cr)
STAT 5101 - Theory of Statistics I (4.0 cr)
STAT 5102 - Theory of Statistics II (4.0 cr)
STAT 5201 - Sampling Methodology in Finite Populations (3.0 cr)
STAT 5302 - Applied Regression Analysis (4.0 cr)
STAT 5303 - Designing Experiments (4.0 cr)
STAT 5401 - Applied Multivariate Methods (3.0 cr)
STAT 5421 - Analysis of Categorical Data (3.0 cr)
STAT 5511 - Time Series Analysis (3.0 cr)
STAT 5601 - Nonparametric Methods (3.0 cr)
STAT 5701 - Statistical Computing (3.0 cr)
STAT 5931 - Topics in Statistics (3.0 cr)
STAT 8051 - Advanced Regression Techniques: linear, nonlinear and nonparametric methods (3.0 cr)
STAT 8052 - Applied Statistical Methods 2: Design of Experiments and Mixed -Effects Modeling (3.0 cr)
STAT 8053 - Applied Statistical Methods 3: Multivariate Analysis and Advanced Regression (3.0 cr)
STAT 8054 - Statistical Methods 4: Advanced Statistical Computing (3.0 cr)
STAT 8056 - Statistical Learning and Data Mining (3.0 cr)
STAT 8101 - Theory of Statistics 1 (3.0 cr)
STAT 8102 - Theory of Statistics 2 (3.0 cr)
STAT 8111 - Mathematical Statistics I (3.0 cr)
STAT 8112 - Mathematical Statistics II (3.0 cr)
STAT 8311 - Linear Models (3.0 cr)
STAT 8312 - Linear and Nonlinear Regression (3.0 cr)
STAT 8321 - Regression Graphics (3.0 cr)
STAT 8401 - Topics in Multivariate Methods (3.0 cr)
STAT 8411 - Multivariate Analysis (3.0 cr)
STAT 8421 - Theory of Categorical Data Analysis (3.0 cr)
STAT 8501 - Introduction to Stochastic Processes with Applications (3.0 cr)
STAT 8511 - Time Series Analysis (3.0 cr)
STAT 8931 - Advanced Topics in Statistics (3.0 cr)
STAT 8932 - Advanced Topics in Statistics (3.0 cr)

Program Sub-plans

Students are required to complete one of the following sub-plans.
Students may not complete the program with more than one sub-plan.

Masters

Doctoral