STATISTICS, MS

The Master of Science degree in Statistics combines theory and application. Our program emphasizes rigorous coursework in probability and mathematical statistics in addition to training in data analysis and computational methods. Graduates from the M.S. program may either directly enter the workforce as junior level statisticians or continue their studies in pursuit of a more advanced degree.

Requirements

Course prerequisites include the equivalent of MATH 6070 Intro To Probability (3 c.h.), MATH 6080 Intro to Statistical Inference (3 c.h.) and MATH 6090 Linear Algebra (3 c.h.). Enrollment in prerequisites does not provide credit towards the M.S. degree.

Non-Thesis Option

Course ID	Title	Credits
Required Courses		
MATH 7150	Probability Theory I	3
MATH 6020/7240	Mathematical Statistics	3
MATH 6040/7260	Linear Models	3
Optional Courses		
Select six courses from the Optional List [1]		18
Total Credit Hours		**27**

[1] The student must have an advisor from the Probability and Statistics faculty. Other courses not listed may be substituted with the approval of the student advisor and the Graduate Studies Committee. Credits may be transferred from other departments or institutions with the approval of the student advisor and the Graduate Studies Committee.

Additional Requirements

A **four-hour written examination** to be taken upon completion of the core course work, with topics drawn from probability, linear models, and statistics. The student is given two chances to pass this exam. The Ph.D. Qualifying examination in Statistics can be substituted for the Masters exam.

- If a student receives at most one grade of B- in the courses, the student is eligible to graduate with a MS in Statistics - without taking the Statistics MS qualifying exam -, assuming the student meets all remaining requirements.

- If a student receives two grades of B-, or one grade less than B- in the courses, the student is placed on probation and considered for dismissal from the program, subject to the Quality of Work Requirements in the SSE Graduate Handbook https://tulane.app.box.com/s/vt0qe6vp53d1wyektfx7qavdgu1w69fx (https://tulane.app.box.com/s/vt0qe6vp53d1wyektfx7qavdgu1w69fx/)

A student who falls into such a situation may apply to take the Statistics MS qualifying exam. The student should communicate with the Director of Graduate Studies to apply to take the exam.

- If a student passes the exam, the student is once again eligible to graduate with a MS in Statistics, assuming all remaining requirements are met.

- Under exonerating circumstances (serious illnesses, injuries, or critical personal problems) that prevent a student from taking the exam on the designated day, the student must notify the Director of Graduate Studies promptly. The student may re-apply to take the exam upon approval of the Graduate Studies Committee.

- Under normal circumstances, if a student fails the exam, the student is no longer eligible to graduate with a MS in Statistics. However, the student may still get the Certificate in Statistics assuming all remaining requirements (for the Certificate) are met.

Optional Courses

Course ID	Title	Credits
MATH 6030/7030	Stochastic Processes	3
MATH 6280	Information Theory	3
MATH 6370/7370	Time Series Analysis	3
MATH 7360	Data Analysis	3
MATH 6350	Optimization	3
MATH 7550	Probability Theory II	3

MATH 7570	Scientific Computatn II	3
MATH 7210	Analysis I	3
MATH 7770	Topics/Probability&Stats	3
Biostatistics/Bioinformatics courses at the 7000 level or above (with approval)		
MATH 7980	Reading and Research [1]	1-9

[1] MATH 7980 Reading and Research (1-9 c.h.) consists of a semester-long project completed under the supervision of a faculty member from the Mathematics Department, generally completed during the final semester of study.

Thesis Option

There is no thesis option for the M.S. in Statistics.