

MATHEMATICAL BUSINESS, B.S.

Requirements

Students interested in pursuing this joint major must be granted formal admission to the program upon application to the School of Business' Committee on Admissions, Continuation, and Scholarships. (<https://bulletin.wfu.edu/undergraduate/school-business/undergraduate-business-program-admission/>) To graduate from Wake Forest University with a major in mathematical business, the student must satisfy the requirements for graduation of both the Department of Mathematics and Statistics (<https://bulletin.wfu.edu/undergraduate/departments-programs/mathematics-statistics/>) and the School of Business (<https://bulletin.wfu.edu/undergraduate/school-business/requirements-graduation/>). This interdisciplinary program, consisting of no more than 51.5 hours, prepares students for careers in business with a strong background in mathematics. The major has the following course requirements:

Code	Title	Hours
Required Major Courses		
MST 113	Multivariable Calculus	4
MST 121	Linear Algebra I	3
MST 253	Operations Research	3
STA 112	Introduction to Regression and Data Science	3
MST/STA 353 or STA 310	Probability Models Probability	3
ACC 221	Introductory Management Accounting	3
BEM 211	Organizational Behavior	3
BEM 221	Principles of Marketing	3
BEM 241	Production and Operations Management	3
BEM 251	Management Information Systems	3
BEM 261	Legal Environment of Business	3
BEM 388	Management Simulation	1.5
BEM 392	Seminar in Mathematical Business Analysis	3
FIN 231	Principles of Finance	3
Select a minimum of two additional courses *		6
Prerequisites for Admission		
ACC 111	Introductory Financial Accounting	3
ECN 150	Introduction to Economics	3
MST 112	Calculus with Analytic Geometry II	4
STA 112	Introduction to Regression and Data Science	3
Recommended Electives		
BEM 383	Seminar in Negotiations	3
BEM 371 or BEM 372	Strategic Management Strategic Management in Entrepreneurial Firms	3
CSC 111 & CSC 112	Introduction to Computer Science and Fundamentals of Computer Science **	8
STA 362	Multivariate Statistics **	3
STA 363	Introduction to Statistical Learning **	3

* Chosen from among mathematics, statistics, economics, and business, with at least one being a mathematics or statistics course (chosen from 3-hour courses at the 300-level or higher), excluding MST 381.

** CSC 111 and/or CSC 112 and STA 362 and/or STA 363 are strongly recommended electives for the major.

Honors

To be graduated with the designation "Honors in Mathematics," "Honors in Applied Mathematics," or "Honors in Mathematical Business," students must satisfactorily complete a senior research paper, and they must have a minimum grade point average of 3.5 in the major and 3.0 in all college coursework. For additional information, members of the departmental faculty should be consulted.