

Department of Mathematics Course Availability Guide



Key: AP = Applied and Pure Mathematics (BS), CM = Computational Mathematics (BS), MFT = Mathematics for Teaching (BA)

Course	Description	Fulfills these requirement(s)	Available in Fall Semester	Available in Spring Semester	Available in Summer Session I	Available in Summer Session II
MATH114QR	Quantitative Reasoning	CLA QR requirement	Yes	Yes	No	No
MATH115	College Algebra	CLA QR requirement	Yes	Yes	Yes	Yes
MATH125	Introductory Statistics	CLA, MCNHS, New CM QR requirement ¹	Yes	Yes	Yes	Yes
MATH129	Managerial Precalculus	MATH134	Yes	Yes	No	No
MATH130 ²	Precalculus	CLA QR requirement	Yes	Yes	Yes	Yes
MATH134	Managerial Calculus	Legacy CM QR requirement ¹	Yes	Yes	Yes	Yes
MATH135 ³	Survey of Calculus	CSM, New CM QR requirement ¹	Yes	Yes	No	No
MATH140 ⁴	Calculus I	CSM, New CM QR requirement ¹ AP, CM, MFT	Yes	Yes	Yes	Yes
MATH141	Calculus II	AP, CM, MFT	Yes	Yes	Yes	Yes
MATH240	Multivariable Calculus ("Calculus III")	AP, CM, MFT	Yes	Yes	No	Yes
MATH242 ⁵	Multivariable & Vector Calculus	AP, CM, MFT	Yes	Yes	No	Yes

Course	Description	Fulfills these requirement(s)	Available in Fall Semester	Available in Spring Semester	Available in Summer Session I	Available in Summer Session II
MATH260	Linear Algebra	AP, CM, MFT	Yes	Yes	No	Yes
MATH265	Discrete Mathematics	AP, CM, MFT	No	Yes	No	No
MATH270	Applied Ordinary Differential Equations	AP, CM, MFT	Yes	Yes	No	No
MATH291	Mathematical Software	AP, CM, MFT	Yes	No	No	No
MATH314	Introduction to Proofs	AP, CM, MFT	Yes	Yes	No	No
MATH345	Probability and Statistics I	AP, CM, MFT	Yes	Yes	Yes	Yes
MATH358	Complex Analysis	AP, CM (required) MFT (elective)	Yes	No	No	No
MATH360 ⁶	Abstract Algebra I	AP, MFT (required) CM (required unless taking MATH450)	Yes	No	No	No
MATH361	Abstract Algebra II	AP (required) MFT, CM (elective)	No	Yes	No	No
MATH370	History of Mathematics	MFT (required) AP, CM (elective)	No	Yes	No	No
MATH390	Problem Solving Seminar	AP, CM, MFT (elective)	Yes	No	No	No
MATH425	Numerical Analysis	CM (required) AP, MFT (elective)	Yes	No	No	No
MATH426	Numerical Linear Algebra	CM (required) AP, MFT (elective)	No	Yes	No	No

Course	Description	Fulfills these requirement(s)	Available in Fall Semester	Available in Spring Semester	Available in Summer Session I	Available in Summer Session II
MATH440	Topology	AP, CM, MFT (elective)	No	Yes	No	No
MATH447	Probability Models	CM (required) AP, MFT (elective)	Yes	No	No	No
MATH448	Computational Statistics	CM (required) AP, MFT (elective)	No	Yes	No	No
MATH450 ⁶	Real Analysis	AP (required) CM (required, unless taking MATH360) MFT (elective)	No	Yes	No	No
MATH455	Introduction to Statistical Machine Learning	AP, CM, MFT (elective)	Yes	No	No	No
MATH458	Theory of Numbers	MFT (elective) AP, CM (elective)	No	Yes	No	No
MATH460	Survey of Geometry	MFT (required) AP, CM (elective)	Yes	No	No	No
MATH470	Mathematical Logic	AP, CM, MFT (elective)	No	No	Yes	No

1 - Students in the College of Management who matriculated in Fall 2024 or after may satisfy their quantitative reasoning requirement by completing MATH125, MATH134, MATH135, or MATH140. Students who matriculated prior to Fall 2024 must complete MATH134.

2 – Students who have previously completed MATH129 may not enroll in MATH130. Instead, they must take a reduced credit version of the course, MATH130R. Much of the content in MATH130 was also learned in MATH129, and students cannot get credit for that material twice.

3 – Students who have previously completed MATH134 may not enroll in MATH135. Instead, they must take a reduced credit version of the course, MATH135R. Much of the content in MATH135 was also learned in MATH134, and students cannot get credit for that material twice.

4 – Students who have previously completed MATH134 or MATH135 may not enroll in MATH140. Instead, they must take a reduced credit version of the course, MATH140R. Much of the content in MATH140 was also learned in MATH134 and MATH135, and students cannot get credit for that material twice.

5 – Students who have previously completed MATH240 may not enroll in MATH242. Instead, they must take a reduced credit version of the course, MATH242R. Much of the content in MATH242 was also learned in MATH240, and students cannot get credit for that material twice.

6 – Students in the computational mathematics concentration must take *either* MATH360 or MATH450, though they may use the other as an elective.