

B.S./M.S., MATHEMATICS

Overview

Accelerated B.S./M.S. Degrees

The combined B.S./M.S. degree allows dedicated mathematics students to complete two degrees in a compressed time frame (typically, five years instead of six), while still maintaining the rigor and content of both degrees. Students will receive a B.S. in mathematics with a concentration in mathematics and an M.S. in mathematics.

Minimum Requirements for Accelerated Mathematics B.S./M.S. Degrees: 138 credits

College of Natural Science and Mathematics
Department of Mathematics and Statistics (<http://www.uaf.edu/dms/>)
907-474-7332

Admission Requirements

Complete the following admission requirements:

- Current admission into a baccalaureate degree program
- At least a 3.0 cumulative GPA
- Completion of 24 credits in the undergraduate major program requirements
- Junior standing

Program Requirements

Minimum Requirements for Mathematics B.S./M.S.: 138 credits

Code	Title	Credits
General University Requirements		
Complete the general university requirements. (http://catalog.uaf.edu/bachelors/)		
General Education Requirements		
Complete the general education requirements. (http://catalog.uaf.edu/bachelors/general-education-requirements/)		
As part of the general education requirements, complete:		
MATH F252X	Calculus II	4
B.S. Degree Requirements		
Complete the B.S. degree requirements. (http://catalog.uaf.edu/bachelors/summary-of-bachelors-degree-reqs/#bachelorofsciencetext)		
As part of the B.S. requirements, complete:		
MATH F253X	Calculus III	4
PHYS F123X and PHYS F124X or PHYS F211X and PHYS F212	College Physics I and College Physics II General Physics I and General Physics II	
Undergraduate Mathematics Program Requirements		
MATH F265	Introduction to Mathematical Proofs	3
MATH F314	Linear Algebra	3
MATH F401	Introduction to Real Analysis	3
MATH F405	Abstract Algebra	3
MATH F410	Introduction to Complex Analysis	3
MATH F490	Senior Seminar ¹	2

Upper-division Mathematics Electives ²	9
Upper-division mathematics or statistics electives ³	6
Total Credits	40

Graduate Mathematics Program Requirements

Code	Title	Credits
Complete the general university requirements. (http://catalog.uaf.edu/graduate/mastersdegrees/#generaluniversityrequirementstext)		
Complete the master's degree requirements. (http://catalog.uaf.edu/graduate/mastersdegrees/#masterofsciencewithprojecttext)		
Complete a written comprehensive exam		
MATH F404	Introduction to Topology	3
MATH F631	Algebra I	4
MATH F641	Real Analysis	4
MATH F645	Complex Analysis	4
MATH F651	Topology	4
Graduate Mathematics Electives ⁴		
MATH F692	Seminar	1
MATH F698 or MATH F699	Non-thesis Research/Project Thesis	6
Total Credits		32

- ¹ Fulfills the baccalaureate capstone requirement.
- ² Acceptable electives include any 3- or 4-credit mathematics course at the 300-level or above.
- ³ Acceptable elective courses include any mathematics or statistics course at the F300 level or above, and CS F201. In some cases, courses with strong mathematical content from other disciplines may be used as electives. Such an elective must be approved by an advisor in the Department of Mathematics and Statistics.
- ⁴ Acceptable elective courses include any mathematics course at the F600 level or above. In some cases, courses with strong mathematical content from other disciplines may be used as electives. Such an elective must be approved by an advisor in the Department of Mathematics and Statistics.

Note: All mathematics majors must have an advisor from the Department of Mathematics and Statistics.

Note: At least 12 approved mathematics credits at the F300 level or above must be taken while in residence on the Fairbanks campus.