

APPLIED MATHEMATICS (BSAM): 3 YEAR OPTION

	Fall Semester		Spring Semester		Summer Semester	
	Course		Course		Course	
First Year	MATH1550 Foundations of Applied Mathematics I	4	MATH1575 Foundations of Applied Mathematics II	4	COOP3000 Pre-Cooperative Work Term (Optional)	0
	MATH1750 Engineering Calculus I	4	MATH1850 Engineering Calculus II	4		
	PHYS1250 Engineering Physics	4	COMP1071 Computer Science II	4		
	COMP1070 Computer Science I	4	PHYS1750 Engineering Physics II	4		
	ENGLISH English Sequence	4	ENGLISH English Sequence	4		
	TOTAL CREDITS	20		20		
Second Year	MATH2100 Probability and Statistics for Engineers	4	MATH2200 Advanced Statistics	4	COOP3500 Co-op Work Semester I	0
	MATH2050 Multivariable Calculus	4	MATH3900 Introduction to Numerical Analysis	4		
	MATH2500 Differential Equations	4	MATH2860 Linear Algebra & Matrix Theory	4		
	MATH2300 Discrete Mathematics	4	ELECTIVE Technical	4		
	ELECTIVE Humanities/Social Science	4	ELECTIVE Humanities/Social Science	4		
	TOTAL CREDITS	20		20		
Third Year	MATH5000 Applied Mathematics Final Year Design I	4	COOP4500 Co-op Work Semester II	0	MATH5500 Applied Mathematics Final Year Design II	4
	MATH3700 Operations Research	4			ELECTIVE Technical	4
	MATH4900 Partial Differential Equations	4			ELECTIVE Technical	4
	ELECTIVE Technical	4			ELECTIVE Humanities/Social Science	4
	ELECTIVE Humanities/Social Science	4			ELECTIVE Humanities/Social Science	4
	TOTAL CREDITS	20				0

APPLIED MATHEMATICS (BSAM): 4 YEAR OPTION

	Fall Semester		Spring Semester		Summer Semester	
	Course		Course		Course	
Freshmen Year	MATH1550 Foundations of Applied Mathematics I	4	MATH1575 Foundations of Applied Mathematics II	4		
	MATH1750 Engineering Calculus I	4	MATH1850 Engineering Calculus II	4		
	PHYS1250 Engineering Physics	4	PHYS1750 Engineering Physics II	4		
	ENGLISH English Sequence	4	ENGLISH English Sequence	4		
	TOTAL CREDITS	16		16		
Sophomore Year	MATH2025 Multivariable Calculus	4	MATH2200 Advanced Statistics	4	COOP3000 Pre-Cooperative Work Term (Optional)	0
	MATH2100 Probability and Statistics for Engineers	4	MATH2860 Linear Algebra & Matrix Theory	4		
	COMP1070 Computer Science I	4	MATH2500 Differential Equations	4		
	ELECTIVE Humanities/Social Science	4	ELECTIVE Humanities/Social Science	4		
	TOTAL CREDITS	16		16		
Junior Year	MATH2300 Discrete Mathematics	4	MATH3900 Introduction to Numerical Analysis	4	COOP3500 Co-op Work Semester I	0
	MATH3700 Operations Research	4	COMP1071 Computer Science II	4		
	ELECTIVE Technical	4	ELECTIVE Technical	4		
	ELECTIVE Humanities/Social Science	4	ELECTIVE Humanities/Social Science	4		
	TOTAL CREDITS	16		16		
Senior Year	MATH5000 Applied Mathematics Final Year Design I	4	COOP4500 Co-op Work Semester II	0	MATH5500 Applied Mathematics Final Year Design II	4
	MATH4900 Partial Differential Equations	4			ELECTIVE Technical	4
	ELECTIVE Technical	4			ELECTIVE Humanities/Social Science	4
	TOTAL CREDITS	16				16

Notes:

1. The 4 year option is the same coursework as the 3 year option. Both options are the same 120 credit hours.
2. In addition to the above coursework requirements (see chart above), students are required to complete the following non-coursework degree requirements:
 - Two public lectures,
 - A website,
 - A poster presentation