

Mathematics, B.S. **Teaching Concentration** 2023-24 Catalog

The example four-year plan is designed to provide a blueprint for students to complete their degrees within four years. These plans include recommended sequences of courses. Individual plans will vary based on previously earned credit, such as Dual Enrollment and AP credit, as well as the student's academic goals. Students will work with an academic advisor to develop a more individualized plan to complete their degree.

This example four-year plan is applicable to students admitted during the 2023–24 academic year.

Total Credits Required: 120 credits Required GPA for Graduation: 2.0 (institutional)

Courses requiring a C or better are denoted with an asterisk (*). Courses only offered in Fall terms are denoted with a plus sign (+). Courses only offered in Spring terms are denoted with a double-plus sign (++).

	Year 1								
	Fall	Spring							
Course	Title	Hours	Area	Course	Title	Hours	Area		
MATH 0001	First-Year Academic Seminar	1		ENGL 1102	English Composition II	3	А		
ENGL 1101*	English Composition I (pre-req to ENGL 1102)	3	А	Core Area C	Humanities and Ethics (student's choice)	3	С		
MATH 1261*	Calculus I (pre-req to MATH 1262, 1401, and 2150, and PHYS 2211/2211L)	4	A	MATH 1262*	Calculus II (pre-req to MATH 2263 and 3030)	4	F		
CSCI 1301*	Computer Science I	3	D	MATH 2150*	Linear Algebra (pre-req to MATH 4989)	3	F		
GC1Y 1000	Critical Thinking (pre-req to GC2Y 2000)	3	В	Core Area E	Social Science (student's choice)	3	Е		
Semester Hours 14					Semester Hours	16			
Summer	If starting Area A with MATH 1113: Pre-Calculus, a student should consider taking MATH 1262 in the summer of Year 1.								
Notes:	Area A and GC1Y 1000 must be completed by 30 earned hours. First-Year Seminar is a graduation requirement and impacts a student's GPA; however, it does not count toward the minimum of 120 semester hours required for a degree.								

Legend is available on the last page of this document.

			Ye	ar 2			
Fall			Spring				
Course	Title	Hours	Area	Course	Title	Hours	Area
MATH 2263*	Calculus III (pre-req to MATH 4261, 4300, 4340, and 4989)	4	F	MATH 4340*	Differential Equations	3	Major
MATH 3030*	Foundations of Mathematics (pre-req to MATH 4081, 4110, 4261, 4300, 4510, and 4989, and MAED 3119 and 3121)	3	Major		Geometry (pre-req to MATH 4081 and MATH 4261)	3	Major
MATH 1401*	Elementary Statistics	3	F	GC2Y 2000	Global Perspectives	4	В
Lang 1001*	World Language I (1001-level)	3	F	Lang 1002*	World Language II (1002-level)	3	F
Core Area C	Fine Arts (student's choice)	3	С	Core Area E	Social Science (student's choice)	3	Е
	Semester Hours	16			Semester Hours	16	
Summer	GC2Y 2000 can be completed during	study a	broad in	the summer.			
Notes:	Students must complete a world language course at the 1002 level or higher. Complete the WebCAPE exam to determine placement for first course. GC2Y 2000 must be taken between 30–59 earned hours.						

Year 3								
	Fall	Spring						
Course	Title	Hours	Area	Course	Title	Hours	Area	
MATH 4300*+	Complex Variables	3	Major	MATH 4261*++	Mathematical Analysis I	3	Major	
MATH 4110*+	Number Theory (pre-req to MATH 4081 and 4261)	3	Major		Intro to Research in Math (pre-req to MATH 4990)	1	Major	
PHYS 2211* + PHYS 2211L*	Principles of Physics I & Lab	4	D	MAED 3121*++	Numbers and Algebra in Secondary Math	3	Major	
MAED 3119*+	Geometry and Measurement in Secondary Math	3	Major	$F(1) > 4475^{+}+$	Seminar: Experience Teaching Math & Science	3	Cognate	
Gen Elective	Any general elective course	3	Elective	Core Area D	Science with Lab (student's choice)	4	D	
Semester Hours 16				Semester Hours		14		
Notes: Students must secure a research advisor and arrange registration for MATH 4989 in the spring of Year 3. EDIS 4425 will not be offered every year, and MAED 3119 and MAED 3121 are only offered every other year. The courses should be taken when offered (provided pre-requisites are met). General electives can be in any discipline and any level (1000–4999).								

Year 4								
	Fall	Spring						
Course	Title	Hours	Area	Course	Title	Hours	Area	
MATH 4990*	Senior Project	3	Major	MATH Elective*	4000-level MATH elective	3	Major	
MATH 4081*+	Abstract Algebra	3	Major	Gen Elective	Any general elective course	4	Elective	
Gen Elective	Any general elective course	4	Elective	Gen Elective	Any general elective course	3	Elective	
Gen Elective	Any general elective course	3	Elective	Gen Elective	Any general elective course	3	Elective	
Gen Elective	Any general elective course	3	Elective					
Semester Hours 1		16			Semester Hours	13		
MATH 4990 is a continuation of the capstone experience and should immediately follow MATH 4989. Arrangements for registration should be coordinated through your research advisor. Notes: One 4000-level MATH elective will be offered per year. Students are advised to take a 4000-level MATH elective when it is offered (provided they meet the prerequisite). General electives can be in any discipline and any level (1000–4999).								

	Legend					
Area	This section of the plan references the area of the curriculum the course fulfills.					
А	A Core Area A: Essential Skills					
В	B Core Area B: Institutional Options					
С	Core Area C: Humanities, Ethics, and Fine Arts					
D	Core Area D: Science, Technology, and Math					
E	Core Area E: Social Sciences					
F	Core Area F: Major Directed Core Requirements					
Major	Mathematics Major Requirements					
Elective	Course(s) a student selects. Hours are needed to meet overall graduation hours. Number of electives varies per major. Electives can be used towards GC Journeys, minors, or professional/graduate school pre-requisites, or to take courses of interest.					
Cognate	Cognate courses are required courses within a student's curriculum. These courses are connected to the major but may be from other academic disciplines.					