## Math B.S. - OPTION III: Integrated Teaching Option

(2016-2017 and 2017-2018 catalogue years)

		10 20	·/ 4	and 201	2010 Calufogue year
GE Requirements (Total 30 units)	Term	Grade		Double ounts as	Continued from left c
Block A: Basic Subjects (9)					Upper Division Required
A1 Oral Communication Course =					MATH 3450 Foundations
A2 Written Communication Course =					MATH 4650 Analysis I (3
					*MATH 3950 Field Expe
A3 Critical Thinking & composition Course =					*MATH 3960 Field Expe
American Institutions (6)		•			MATH 4300 Modern Geo
US History course =					MATH 4460 Theory of N
US Constitution course =					MATH 4550 Modern Alg Linear Algebra (3) MATH 4740 Theory of Pr
Block B: Natural Sciences (0)					MATH 4901 Capstone Co
Fulfilled by major requirements					Mathematics (4) Related Area Electives**
Block C: Arts and Humanities (6)			-		Course1 =
C1 Arts Course =					Credential Required Con
					<b>Block 0: Prerequisite Blo</b>
C2 Humanities Course =					EDCI 4000 - Transformati Urban Classrooms (3)
Block D: Social Sciences (6)					EDFN 4200 - Education F
D1 Course =					Equity in Urban schools (2
D2 Course =					EDFN 4130 – Introduction Foundations of Education
Block E: Lifelong Understanding and	Solf dov	alanma	nt (	(3)	EDSE 5000 – Transformat
E Course = AAAS 1001 (suggested for	Sell-uev			(3)	and Management (3) EDSP 4000 –Foundations
transfer students)**					
Block F: Upper Division Blocks B, C,	D (0)				Block 1: Developmental
Fulfilled by major requirements					EDSE 4301 - Supporting
GWAR Requirements (0)					Development for English
UNIV 400 Writing Proficiency Exam (0) An IHE course is required of all first time freshme	en.				*EDSE 4501 – Language (1)
Major Requirement (Total 105 Units) Math & Credential Courses Lower Division Required Courses (36 un MATH 2170 (3) or CS 2011 (3)		erm Gr	ade	Double counts as	*EDSE 4101- Intersection and Students from Urba OR EDFN 3130- Diversity, I (Note: Students may be a
*MATH 2110 Calculus I (4)				Block B4	for this requirement) Block 2: Instructional B EDSE 4212M -Instruction
					Secondary School Subject

*MATH 2110 Calculus I (4)	Block B4
MATH 2120 Calculus II (4)	
MATH 2130 Calculus III (3)	
MATH 2150 Differential Equations (3)	
MATH 2450 Foundations of Mathematics I (3)	
MATH 2550 Introduction to Linear Algebra (3)	
Math 2740 Introduction to Statistics (3)	
*PHYS 2100 General Physics I (5)	Block B1
*BIOL 1100 - Principles of Biology I (5)	Block

**GE REQUIREMENTS:** One race/ethnicity course (re), and one civic learning course (cl), and an IHE course must be fulfilled in lower division GE blocks by freshmen. \*\**GE certified transfer students do not need IHE course and are advised to choose AAAS 1001 to cover cl and re requirements in GE block E.* 

All other requirements (One upper division Civic Learning course (cl), two writing intensive courses (WI), and one diversity course (d)) are met within the major.

Continued from left column	Term	Grade	Double counts as
Upper Division Required Courses (27 units)	1	1	as
MATH 3450 Foundations of Mathematics II (4)	1		
MATH 4650 Analysis I (3)			
*MATH 3950 Field Experience I (2)			cl, WI
MATH 5750 FRW Experience I (2)			UD GE B
*MATH 3960 Field Experience II (2)			cl, WI UD GE
MATU 4200 Modern Coometry (2)			В
MATH 4300 Modern Geometry (3)			
MATH 4460 Theory of Numbers (3)			
MATH 4550 Modern Algebra (3) OR MATH 4570			
Linear Algebra (3)			
MATH 4740 Theory of Probability (3)			
MATH 4901 Capstone Course for Teachers of			WI
Mathematics (4) Related Area Electives*** (3 units)		L	
Course1 =			
Credential Required Courses (39 units)			
Block 0: Prerequisite Block (13 units)			
EDCI 4000 - Transformative Teaching in Diverse			
Urban Classrooms (3)			
EDFN 4200 - Education Foundations: Diversity and			
Equity in Urban schools (2)			
EDFN 4130 - Introduction to Psychological			
Foundations of Education (2)			
EDSE 5000 – Transformative Classroom Instruction			
and Management (3)			
EDSP 4000 – Foundations of Special Education (3)			
Block 1: Developmental Block (7 units)			
EDSE 4301 - Supporting Academic Language			
Development for English Learners (3)			
*EDSE 4501 – Language and Literacy in Context			UD GE C
(1)			-
*EDSE 4101- Intersectional Diversity in Families			UD GE D and
and Students from Urban Schools (3) OR			(d)
EDFN 3130- Diversity, Intersectionality etc. (3)			
(Note: Students may be asked to take EDSE 5101			
for this requirement)			
Block 2: Instructional Block (11 units)			
EDSE 4212M -Instructional Methods for			
Secondary School Subjects-Mathematics (3) EDCI 4292- 21 <sup>st</sup> Century Assessment Strategies			
and Processes (3)			
*EDSE 4502 -Understanding Academic			L
Language Development (2)			UD GE C
EDSE 5002 – Advanced Secondary Instructional			
and Management Strategies (3)			
Block 3: Application Block (8 units)			
EDSE 4453 - Directed Teaching in Secondary Schools (5)			
EDSE 4463 - Proseminar: Assessment of			ļ
Teaching Performance (3)			

## **GRADUATION REQUIREMENTS**

Minimum **40** units of upper division courses AND **120** total units are required for graduation. For an extensive list of other graduation requirements, check "academic requirement" in your GET account.

**\*DOUBLE COUNT** The courses shown in bold font double count for certain requirements as shown on right most column.

## \*\*\*RELATED AREA ELECTIVES

The approved list of ALL electives can be obtained at math dept. webpage.

## Advisor Name/Signature