## **Mathematics Education (CMAB)**

Fall         Hours         Spring         Hours           ENGL 1100 English Composition I         3         2 RNGL 1120 English Composition II         3           Core History I         3         2 Core History II         3           Core Fine Arts         3         2 Core Social Science         3           Core Social Science         3         EDUC 1010 Orientation to Teacher Education 1-2         0           MATH 1610 Calculus I or 1617 Honors Calculus I         4         MATH 1620 Calculus II         4           Sophomore           Fall         Hours         Spring         Hours           Core Literature         3         COMM 1000 Public Speaking         3           AMATH 2630 Calculus III         4         MATH 2650 Linear Differential Equations         3           AMATH 2630 Calculus III         4         MATH 2660 Topics in Linear Algebra         3           AMATH 2650 Calculus II         4         MATH 2660 Topics in Linear Algebra         4           Calculus Calculus II         4         MATH 2660 Topics in Linear Algebra         4           Calculus Calculus II         5         A CITAD 5910 Teaching Mathematics: Middle and Learning Mathematics Education In Accountary Mathematics Education In Calculus Calculus Calcul	Freshman					
Core Flistory I         3 Core Flistory II         3 Core Flistory II         3           Core Fine Arts         3 Core Social Science         3           Core Social Science         3 EDUC 1010 Orientation to Teacher Education 1.2         0           MATH 1610 Calculus I or 1617 Honors Calculus II         4 MATH 1620 Calculus II         4           MATH 1610 Calculus I or 1617 Honors Calculus II         16         13           Sophomore         Fall         Hours         Formal Spring         Hours           Core Literature         3 COMM 1000 Public Speaking         3         1           MATH 2630 Calculus III         4 MATH 3650 Linear Differential Equations         3         3           Core Science I         4 MATH 3100 Introduction to Advanced Mathematics         3         3         3         4	Fall	Hours		Spring	Hours	
Core Fine Arts	ENGL 1100 English Composition I		3	ENGL 1120 English Composition II		3
ACTIVED Social Science   3 EDUC 1010 Orientation to Teacher Education   1.2   0	Core History I		3	Core History II		3
MATH 1610 Calculus   0 r 1617 Honors Calculus   1	Core Fine Arts		3	Core Social Science		3
16	Core Social Science		3	EDUC 1010 Orientation to Teacher Education 1,2		0
Sophomore         Fall         Hours         Spring         Hours           Core Literature         3 COMM 1000 Public Speaking         3           MATH 2630 Calculus III         4 MATH 2650 Linear Differential Equations         3           Core Science I         4 MATH 3100 Introduction to Advanced Mathematics         3           Elective         3 MATH 2660 Topics in Linear Algebra         3           Humanities Core         3 Core Science II         4           Junior         17         16           Fall         Hours         Spring         Hours           CTSE 5040 Technology and Applications in Secondary Mathematics Education I         4 CTMD 5010 Teaching Mathematics: Middle School I	MATH 1610 Calculus I <i>or</i> 1617 Honors Calculus I		4	MATH 1620 Calculus II		4
Fail   Hours   Spring   Hours   Spring   Hours   Spring   3   3   3   3   3   3   3   3   3			16			13
Core Literature	Sophomore					
MATH 2630 Calculus III         4 MATH 2550 Linear Differential Equations         3           Core Science I         4 MATH 3100 Introduction to Advanced Mathematics         3           Elective         3 MATH 2660 Topics in Linear Algebra         3           Humanities Core         3 Core Science II         4           Junior         Fall         Hours         Spring         Hours           CTSE 5040 Technology and Applications in Secondary Mathematics Education I         4 CTMD 5010 Teaching Mathematics: Middle School I.2         3 MATH 3010 History of Mathematics: Middle School I.2         3 MATH 3010 History of Mathematics I.2         3 MATH 3010 Histo	Fall	Hours		Spring	Hours	
Elective 3 MATH 2660 Topics in Linear Algebra 3 Humanities Core 3 Core Science II 4  Hours Spring Mathematics: Middle School 1,2  FOUN 3000 Diversity of Learners and Settings 3 MATH 3010 History of Mathematics: Middle School 1,2  RSED 3000 Diversity and Exceptionality of Learners 1 MATH 5310 Introduction to Abstract Algebra I 2  AMATH 5330 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  Senior  Fall Hours Spring Mathematics I Settings 3  MATH 5330 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  MATH 5300 Adolescent Development, Learning, Motivation and Assessment I I 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment I I 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment I I 16  CTSE 5030 Teaching Mathematics: High School 1 4 CTSE 4920 Clinical Residency 3 11  MATH 5200 Analysis I 1,2  Discrete Math Elective 5 3  CTRD 5000 Language and Literacy in the Content Areas 1,2  Total Content I 16  CTSE 5030 Language and Literacy in the Content Areas 1,2	Core Literature		3	COMM 1000 Public Speaking		3
Mathematics   Mathematics   Second   Mathematics   Mathe	MATH 2630 Calculus III		4	MATH 2650 Linear Differential Equations		3
Humanities Core 3 Core Science II 17 16  Junior  Fall Hours Spring Hours  CTSE 5040 Technology and Applications in Secondary Mathematics Education 1 School 1-2  FOUN 3000 Diversity of Learners and Settings 2 3 FOUN 3110 Adolescent Development, Learning, Motivation and Assessment I Searners 1  MATH 5310 Introduction to Abstract Algebra I 2 3 STAT 3600 Probability and Statistics I 3 3 MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  MATH 5380 Intermediate Euclidean Geometry I 16 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II 2  CTSE 5030 Teaching Mathematics: High School 1 4 CTSE 4920 Clinical Residency 3 11  MATH 5200 Analysis 1-2 3 CTSE 5230 Managing Middle and High School 1 Classroom (Math Education) 2-4  CTSD 5000 Language and Literacy in the Content Areas 1-2	Core Science I		4			3
Table 10 Junior  Fall Hours Spring Hours  CTSE 5040 Technology and Applications in Secondary Mathematics Education 1 School 1.2 Scho	Elective		3	MATH 2660 Topics in Linear Algebra		3
Junior Fall Hours Spring Hours  CTSE 5040 Technology and Applications in Secondary Mathematics Education 1 School 1,2  FOUN 3000 Diversity of Learners and Settings 2 3 FOUN 3110 Adolescent Development, Learning, Motivation and Assessment I  RSED 3000 Diversity and Exceptionality of Learners 1 3 MATH 3010 History of Mathematics 2 3 STAT 3600 Probability and Statistics I 3 MATH 5310 Introduction to Abstract Algebra I 2 3 STAT 3600 Probability and Statistics I 3 MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3 16 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II 2  CTSE 5030 Teaching Mathematics: High School 1 4 CTSE 4920 Clinical Residency 3 11  MATH 5200 Analysis I 1,2 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) 2,4  Discrete Math Elective 5 3 CTRD 5000 Language and Literacy in the Content Areas 1,2	Humanities Core		3	Core Science II		4
Fall Hours Spring Hours  CTSE 5040 Technology and Applications in Secondary Mathematics Education 1 School 1.2  FOUN 3000 Diversity of Learners and Settings 2 3 FOUN 3110 Adolescent Development, Learning, Motivation and Assessment I  RSED 3000 Diversity and Exceptionality of Learners 1  MATH 5310 Introduction to Abstract Algebra I 2 3 STAT 3600 Probability and Statistics I 3 MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  MATH 5380 Intermediate Euclidean Geometry I 16 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II 2  CTSE 5030 Teaching Mathematics: High School 1 4 CTSE 4920 Clinical Residency 3 11  MATH 5200 Analysis I 1.2 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) 2.4  Discrete Math Elective 5 3 CTRD 5000 Language and Literacy in the Content Areas 1.2			17			16
CTSE 5040 Technology and Applications in Secondary Mathematics Education School 1,2  FOUN 3000 Diversity of Learners and Settings 3 FOUN 3110 Adolescent Development, Learning, Motivation and Assessment I  RSED 3000 Diversity and Exceptionality of Learners 1  MATH 5310 Introduction to Abstract Algebra I 3 STAT 3600 Probability and Statistics I 3 MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II 2  CTSE 5030 Teaching Mathematics: High School 1 AMATH 5200 Analysis I 1,2  Discrete Math Elective 5 3  CTRD 5000 Language and Literacy in the Content Areas 1,2	Junior					
Secondary Mathematics Education School Schoo	Fall	Hours		Spring	Hours	
Motivation and Assessment I  RSED 3000 Diversity and Exceptionality of Learners¹  MATH 5310 Introduction to Abstract Algebra I² 3 STAT 3600 Probability and Statistics I 3 MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 3 MATH 5000 Level 3 MATH 5000 Level 3 MATH 5000 Level 16 Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II²  CTSE 5030 Teaching Mathematics: High School¹ 4 CTSE 4920 Clinical Residency³ 11 MATH 5200 Analysis I¹.² 3 CTSE 5230 Managing Middle and High School Classroom (Math Education)².⁴  Discrete Math Elective⁵ 3 CTRD 5000 Language and Literacy in the Content Areas¹¹.²			4	CTMD 5010 Teaching Mathematics: Middle School <sup>1,2</sup>		4
Learners¹  MATH 5310 Introduction to Abstract Algebra I²  3 STAT 3600 Probability and Statistics I  3 MATH 5380 Intermediate Euclidean Geometry I  3 MATH 5000 Level  3 MATH 5000 Level  3 MATH 5000 Level  3 MATH 5000 Level  16 Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II²  CTSE 5030 Teaching Mathematics: High School¹  MATH 5200 Analysis I¹,²  3 CTSE 5230 Managing Middle and High School Classroom (Math Education)²,⁴  Discrete Math Elective⁵  3 CTRD 5000 Language and Literacy in the Content Areas¹,²	FOUN 3000 Diversity of Learners and Settings <sup>2</sup>		3			3
MATH 5380 Intermediate Euclidean Geometry I 3 MATH 5000 Level 16 16  Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School 1 4 CTSE 4920 Clinical Residency 3 11  MATH 5200 Analysis I 1, 2 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) 2, 4  Discrete Math Elective 5 3  CTRD 5000 Language and Literacy in the Content Areas 1, 2			3	MATH 3010 History of Mathematics <sup>2</sup>		3
Senior  Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School <sup>1</sup> MATH 5200 Analysis I <sup>1,2</sup> Discrete Math Elective <sup>5</sup> CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup>	MATH 5310 Introduction to Abstract Algebra I <sup>2</sup>		3	STAT 3600 Probability and Statistics I		3
Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School MATH 5200 Analysis I <sup>1,2</sup> Discrete Math Elective <sup>5</sup> CTRD 5000 Language and Literacy in the Content Areas 1,2  Hours Spring Hours  3 UNIV 4AA0 Achieve the Creed  0 CTSE 4920 Clinical Residency <sup>3</sup> 11  CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup>	MATH 5380 Intermediate Euclidean Geometry I		3	MATH 5000 Level		3
Fall Hours Spring Hours  FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School <sup>1</sup> MATH 5200 Analysis I <sup>1,2</sup> Discrete Math Elective <sup>5</sup> CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup> Hours  Spring Hours  CTSE 4920 Clinical Residency <sup>3</sup> 11  CTSE 4920 Clinical Residency <sup>3</sup> 12  CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> 3  CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup>			16			16
FOUN 3120 Adolescent Development, Learning, Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School <sup>1</sup> MATH 5200 Analysis I <sup>1,2</sup> Discrete Math Elective <sup>5</sup> 3  CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup> 3 UNIV 4AA0 Achieve the Creed  0 CTSE 4920 Clinical Residency <sup>3</sup> 11  CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> 3 CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup>	Senior					
Motivation and Assessment II <sup>2</sup> CTSE 5030 Teaching Mathematics: High School <sup>1</sup> MATH 5200 Analysis I <sup>1,2</sup> Discrete Math Elective <sup>5</sup> CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup> Areas <sup>1,2</sup> A CTSE 4920 Clinical Residency <sup>3</sup> 11  CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> 3  CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup>	Fall	Hours		Spring	Hours	
MATH 5200 Analysis I <sup>1,2</sup> 3 CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup> Discrete Math Elective <sup>5</sup> 3 CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup>			3	UNIV 4AA0 Achieve the Creed		0
Classroom (Math Education) <sup>2,4</sup> Discrete Math Elective <sup>5</sup> CTRD 5000 Language and Literacy in the Content  Areas <sup>1,2</sup> 3	CTSE 5030 Teaching Mathematics: High School <sup>1</sup>		4	CTSE 4920 Clinical Residency <sup>3</sup>		11
CTRD 5000 Language and Literacy in the Content 3 Areas <sup>1,2</sup>	MATH 5200 Analysis I <sup>1,2</sup>		3	CTSE 5230 Managing Middle and High School Classroom (Math Education) <sup>2,4</sup>		1
Areas <sup>1,2</sup>	Discrete Math Elective <sup>5</sup>		3			
16 12	CTRD 5000 Language and Literacy in the Content Areas <sup>1,2</sup>		3			
			16			12

**Total Hours: 122** 

- 2 Mathematics Education (CMAB)
- Prerequisite for Admission to Teacher Education.
- Prerequisite for admission to Clinical Residency.
- <sup>3</sup> Prerequisite: Admission to Clinical Residency (application for Clinical Residency is one year in advance).
- Co-requisite with Clinical Residency.
- Select one of the following: MATH 5120/MATH 5140/MATH 5150/MATH 5180/ MATH 5300/MATH 5730/MATH 5750/MATH 5770