Mathematics, B.S. - Applied Mathematics/Statistics Subplan/Option: 120 units

2019-2020 Academic Year

	Fall		Units	Spring		Units	Comments
	Courses	**Requirements/Comments**		**Courses**	**Requirements/Comments**		
Year 1	MAT 1140 Calculus I (B4) (Success Marker)	Prereq: C or better in MAT 1050 and MAT 1060, or appropriate score on MDTP or ALEKS placement test.	4	MAT 1150 Calculus II (B4) (Success Marker)	Prereq: MAT 1140, MAT 115B, MAT 1140C, AP Calc AB >=3, or AP Calc BC >=3.	4	
	ENG 1103 First Year Composition (A2) (Success Marker)	or ENG 1101 Stretch Composition II (A2)	3	PHY 1510 Introduction to Newtonian Mechanics (B1)	Prereq: C- or better in MAT 114 or MAT 1140. Coreq: PHY 1510L.	3	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	PHY 1510L Newtonian Mechanics Laboratory (B3)	Coreq: PHY 1510.	1	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	GE Area B2: Life Sciences	If a year of PHY 1510/L and 1520/L is planned, any B2 course. If only one semester of PHY 1510/L is planned, must take BIO 1210/L followed by and BIO 1220/L	3	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	
		Total Units	**16**		**Total Units**	**14**	

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Year 2	MAT 2140 Calculus III	Prereq: MAT 116, MAT 214, MAT 1150, or MAT 1150C.	4	MAT 2010 Introduction to Computational Methods in Mathematics	Prereq: MAT 116 or MAT 1150. Coreq: MAT 2010L.	2	
	MAT 2250 Linear Algebra with Applications to Differential Equations	Prereq: MAT 116, MAT 1150, or MAT 1150C.	4	MAT 2010L Introduction to Computational Methods in Mathematics Laboratory	Coreq: MAT 2010.	1	
	Major Required	PHY 1520/L Introduction to Electromagnetism / Laboratory and Circuits or BIO 1220/L Foundations of Biology: Evolution, Ecology, and Biodiversity /Laboratory (see note on B2 course in Spring Year 1.)	4	STA 2100 Introduction to Statistics	Prereq: AP Calc AB, AP Calc B, MAT 114, MAT 1140, MAT 120, MAT 1200, MAT 130, MAT 1300, MAT 115, MAT 1150, MAT 116, MAT 214, MAT 2140, or MAT 215.	4	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	MAT 3100 Introduction to Mathematical Proof	Prereq: MAT 116 or MAT 1150.	4	
			0	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements.	3	
		Semester Total Units	**15**		**Semester Total Units**	**14**	

	Fall		Units	Spring		Units	Comments
	Courses	**Requirements/Comments**		**Courses**	**Requirements/Comments**		
Year 3	STA 2200 Introduction to Probability	Prereq: STA 2100.	3	MAT 4170 Introduction to Abstract Algebra I	Prereq: MAT 310 or MAT 3100.	4	*Graduation Writing Test must be taken before completion of 75 units.*
	MAT 3140 Introduction to Real Analysis I	Prereq: MAT 310 or MAT 3100; and MAT 215 or MAT 2140.	4	Option Elective	Select from Curriculum Sheet	4	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	Option Electives	Select from Curriculum Sheet	3	
	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	Lower Division GE	Lower Division GE areas: Choose any class from areas A1, A3, C1, C2, D1, D2, and D3. Take one class from each area, plus one additional class from area C1 or C2, in order to complete GE requirements	3	
	Option Electives	Select from Curriculum Sheet	3			0	
	Take the Graduation Writing Test						
		Semester Total Units	**16**		**Semester Total Units**	**14**	

	Fall		Units	Spring		Units	Comments
	Courses	**Requirements/Comments**		**Courses**	**Requirements/Comments**		
Year 4	MAT 4190 Advanced Linear Algebra	Prereq: MAT 208 or MAT 2250; and MAT 310 or MAT 3100.	4	MAT 4280 Functions of a Complex Variable	Prereq: MAT 3140 and MAT 2140; MAT 314 and MAT 2140; MAT 3140 and MAT 215; or MAT 314 and MAT 215.	4	
	Option Electives	Select from Curriculum Sheet	3	Upper Division Synthesis GE	Prereq: GE areas: B5, C3, D4	3	
	Option Elective	Select from Curriculum Sheet	3	Upper Division Synthesis GE	Prereq: GE areas: B5, C3, D4	3	
	Upper Division Synthesis GE	Prereq: GE areas: B5, C3, D4	3	Unrestricted Elective		3	
	Unrestricted Elective		2	Unrestricted Elective		3	
	File an application to graduate						
		Semester Total Units	**15**		**Semester Total Units**	**16**	
					Total Units	**120**	