

Major: Civil Engineering, B.S. - Environmental Engineering Subplan/Option: 126 units  
2018-2019 Academic Year

	Fall		Units	Spring		Units	Comments
	Courses	Requirements/Comments		Courses	Requirements/Comments		
<b>Year 1</b>	CE 1001 Civil Engineering	Prereq: BSCE, BSCET, BSCEM or MSCE Major. Coreq: CE 1001L or CE 127L; and College Level Math.	1	CE 1011 Surveying Engineering	Prereq: CE 1001L, CE 1101L, or CE 127; and MAT 114, MAT 1140, MAT 130, or MAT 1300; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 1011L or CE 134L.	3	
	CE 1001L Civil Engineering Laboratory	Prereq: BSCE, BSCET, BSCEM or MSCE Major. Coreq: CE 1001 or CE 127; and College Level Math.	1	CE 1011L Surveying Engineering Laboratory	Prereq: CE 1001L, CE 1101L, or CE 127L; MAT 114, MAT 1140, MAT 130, or MAT 1300; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 1011 or CE 134.	1	
	EGR 1000 Engineering, Society, and You (E)		2	CHM 1210 General Chemistry I (B1)	Prereq: C or better in MAT 12, 105, 106, 112, 114, 115, 116, 120, 125, 130, 191, 214, 216, 224, MAT 1050, MAT 1052, MAT 1060, MAT 1140, MAT 1150, MAT 1200, MAT 1250, MAT 1300, MAT 1310, MAT 1910, MAT 2140, MAT 2240, MAT 2250, STA 120, or STA 1200; or C- o	3	
	EGR 1000L Engineering, Society, and You Laboratory (E)		1	CHM 1210L General Chemistry Laboratory I (B3)	Prereq: C or better in MAT 12, 105, 106, 112, 114, 115, 116, 120, 125, 130, 191, 214, 216, 224, MAT 1050, MAT 1052, MAT 1060, MAT 1140, MAT 1150, MAT 1200, MAT 1250, MAT 1300, MAT 1310, MAT 1910, MAT 2140, MAT 2240, MAT 2250, STA 120, or STA 1200; or C- o	1	
	MAT 1140 Calculus I (B4)	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)	Prereq: MAT 1140, MAT 115B, MAT 1140C, AP Calc AB $\geq 3$ , or AP Calc BC $\geq 3$ .	4	
	GE Area A1: Oral Communication		3	PHY 1510 Introduction to Newtonian Mechanics (B1)	Prereq: C- or better in MAT 114 or MAT 1140. Coreq: PHY 1510L.	3	
	BIO 1110 Life Science (B2)	Prereq: Undergraduate standing. Coreq: BIO 1110L.	2	PHY 1510L Newtonian Mechanics Laboratory (B3)		1	
	GE Area A2: Written Communication		3				
	<b>Total Units</b>		<b>17</b>	<b>Total Units</b>		<b>16</b>	

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<b>Year 2</b>	CE 2021 Infrastructure Economics and Public Policy	Prereq: College Level and BSCE, BSCE, BSCEM, or MSCE Major.	3	CE 2011 Technical Communications	Prereq: GE Area A and BSCE, BSCE, BSCEM, or MSCE Major.	3	
	CE 2041 Engineering Statics	Prereq: C- or better in MAT 115, MAT 1150, MAT 130, or MAT 131; PHY 131 or PHY 1510, and PHY 1510L or PHY 131L.	3	CE 2051 Mechanics of Materials	Prereq: C- or better in ME 214, ETT 210, CE 2041, ARO 2041, or ETM 2101.	3	
	MAT 2140 Calculus III	Prereq: MAT 116, MAT 214, MAT 1150, or MAT 1150C.	4	MAT 2240 Elementary Linear Algebra and Differential Equations	Prereq: MAT 116 or MAT 1150.	3	
	BIO 2060 Basic Microbiology	Prereq: BIO 123/BIO 123L, BIO 1220/BIO 1220L, BIO 122/BIO 122L/BIO 1220C, BIO 115/BIO 115L/BIO 115A, or BIO 1150/BIO 1150L. Coreq: BIO 2060L.	3	GSC 3210 Engineering Geology I (B5)	Prereq: Completion of the lower division GE requirements in Area A and Area B; and Upper Division standing. Coreq: GSC 3210L.	2	
	BIO 2060L Basic Microbiology Laboratory	Prereq: BIO 123/BIO 123L, BIO 1220/BIO 1220L, BIO 122/BIO 122L/BIO 1220C, BIO 115/BIO 115L/BIO 115A, or BIO 1150/BIO 1150L. Coreq: BIO 2060.	1	GSC 3210L Engineering Geology I Laboratory (B5)	Prereq: Completion of Lower Division GE requirements in Area A and Area B; and Upper Division standing. Coreq: GSC 3210.	1	
	GE Area C1: Visual and Performing Arts		3	GE Area D1: U.S. History American Ideals		3	
			0			0	
			0			0	
		<b>Semester Total Units</b>	<b>17</b>		<b>Semester Total Units</b>	<b>15</b>	

	Fall		Units	Spring		Units	Comments
	Courses	Requirements/Comments		Courses	Requirements/Comments		
<b>Year 3</b>	CE 2030 Civil Engineering Materials	Prereq: C- or better in ME 218, ETT 220, or CE 2051; CHM 121 or CHM 1210; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 221L or CE 2030L.	2	CE 3201 Environmental Engineering	Prereq: CHM 121 or CHM 1210 ; CHM 121L or CHM 1210L; BIO 110 or BIO 1110; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 3201L; and CE 2061 or ME 311.	3	<i>Graduation Writing Test must be taken before completion of 75 units.</i>
	CE 2030L Civil Engineering Materials Laboratory	Prereq: C- or better in ME 218, ETT 220, or CE 2051; CHM 121L or CHM 1210L . Coreq: CE 221 or CE 2030.	1	CE 3201L Environmental Engineering Laboratory	Prereq: CHM 121 or CHM 1210; CHM 121L or CHM 1210L; BIO 110 or BIO 1110 and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 3201; and CE 2061 or ME 311.	1	
	CE 2061 Fluid Mechanics	Prereq: C- or better in ME 214, ETT 210, CE 2041, ARO 2041, or ETM 2101.	3	CE 3211 Water Resources Engineering	Prereq: CE 2061 or ME 311; and BSCE, BSCET, BSCEM, or MSCE Major.	3	
	CE 2070 Computer Programming and Numerical Methods	Prereq: C- or better in MAT 224, MAT 2240, or MAT 216.	3	GE Area D2: U.S. Constitution and California Government		3	
	IME 3011 App. of Stats in Engineering	Prereq: MAT 115, MAT 116, MAT 214, MAT 215, MAT 216, MAT 224, or MAT 1150.	2	Major Core	Select among CE 3101/L, CE 3301, CE 3401/L, CE 3501/L, and CE 3601/L	3	
	GE Area C2a: Philosophy and Civilization		3	Major Core	Select among CE 3101/L, CE 3301, CE 3401/L, CE 3501/L, and CE 3601/L	3	
	GE Area C2b: Literature and Language Other than English		3			0	
			0			0	
	<i>Take the Graduation Writing Test</i>						
	<b>Semester Total Units</b>		<b>17</b>	<b>Semester Total Units</b>		<b>16</b>	

Year 4	Fall		Units	Spring		Units	Comments
	Courses	Requirements/Comments		Courses	Requirements/Comments		
	EGR 4810 Project Design Principles and Applications (B5)		1	EGR 4820 Project Design Principles and Applications (B5)		1	
CE 4211 Applied Hydrology	Prereq: CE 332 or CE 3211; and BSCE, BSCET, BSCEM, or MSCE Major.	3	EGR 4830 Project Design Principles and Applications (B5)		1		
CE 4201 Water and Wastewater Engineering	Prereq: ME 311 or CE 2061; CHM 121L or CHM 1210L; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 4201L.	3	Option Elective	Select from Curriculum Sheet	3		
CE 4201L Water and Wastewater Engineering Laboratory	Prereq: ME 311 or CE 2061; CHM 121L or CHM 1210L; and BSCE, BSCET, BSCEM, or MSCE Major. Coreq: CE 4201.	1	Option Elective	Select from Curriculum Sheet	3		
CE 4241 Environmental Remediation	Prereq: CE 351 or CE 3201; and BSCE, BSCET, BSCEM, or MSCE Major.	3	IME 4020 Ethical Concepts in Technology and Applied Science (B5, C3)		3		
GE Area D3: Social Sciences: Principles, Methodologies, Value Systems, and Ethics		3	EGR 4050 Role of Design Professionals In Society (D4)	BSCE, BSCET, BSCEM, or MSCE Major.	3		
		0			0		
		0			0		
<i>File an application to graduate</i>							
<b>Semester Total Units</b>		<b>14</b>	<b>Semester Total Units</b>		<b>14</b>		
					<b>Total Units</b>	<b>126</b>	