

## B.S. in Civil Engineering 2022-23

**GE courses are required to graduate with a Bachelor's Degree from SUU.**

Foundation Course: Select One	ENGR 1010	Engineering in the 21st Century	3	F/S	
	ENGR 1050	Intro to Engineering Design	1	F/S	MATH 1010 or higher (can take 1050+ concurrently)
Core Requirements	CCET 1040	Intro to Residential Arch. - AutoCAD	3	F/S/Su	
	CCET 2240/45	Plane Surveying and GPS/Lab	2/1	F	MATH 1060
	CCET 3670	Civil Design	3	S	CCET 1040
	CE 3100	Structural Analysis	3	F	ENGR 2140
	CE 4055	Capstone Design	3	F/S	CM 4300*, Senior standing, take in last semester
	CE 4100	Des. of Reinforced Concrete Structures	3	S-Odd	CE 3100
	CHEM 1210/15	Principles of Chemistry	4/1	F/S/Su	MATH 1050 or higher, ACT 26
	CM 3240	Estimating and Bidding	3	F	MATH 1050 and MATH 1060
	CM 4300	Construction Project Mgmt Ldrshp	3	F	CM 3240 or CM 3880
	CM 4880	Construction Documents & Administration	3	S	CM 3240 and (CM 1000 or ENGR 1050)
	ENGR 2010	Statics	3	F/S/Su	MATH 1210
	ENGR 2140/45	Strength of Materials/Lab	3/1	F/S/Su	ENGR 2010, MATH 1220, ENGL 2010
	MATH 1210	Calculus I	4	F/S/Su	MATH 1050, 1060, ALEKS 75 ACT 26
	MATH 1220	Calculus II	4	F/S/Su	MATH 1210
	MATH 2250	Linear Algebra & Differential Equations	4	F/S	MATH 1220
	ME 2030	Dynamics	3	F/S/Su	ENGR 2010, PHYS 2210
	ME 3100	Materials Science	3	F	CHEM 1210/15, MATH 1210
	ME 3300/05	Fluid Mechanics/Lab	3/1	S/Su	PHYS 2210, MATH 1220
PHYS 2210/15	Physics for Scientists & Engineers I	4/1	F/S/Su	MATH 1210	
PHYS 2220/25	Physics for Scientists & Engineers II	4/1	F/S/Su	PHYS 2210/15, MATH 1220	
Choose One	MATH 1031	Statistical Reasoning	3	F/S/Su	MATH 0970 or 0990 or 1010
	MATH 1040	Statistical Inference	4	F/S/Su	MATH 1010
	MATH 3700	Probability and Statistics	4	F/S/Su	MATH 1220
Civil Engineering Breadth: Choose 9 Credits	CE 3200	Hydraulic Engineering and Hydrology	3	F-as needed	ME 3300/05 or CM 4600 or CCET 3670
	CE 3300	Intro to Transportation Engineering	3	F	MATH 1031 or 1040 or 3700
	CE 3400	Intro to Environmental Engineering	3	F-as needed	CHEM 1210
	CE 4150	Soils & Foundations Design/Construct.	3	S	(CM 3270 & ENGR 2000) or CE 3100
	CM 4600	Heavy Civil Constr. Des., Methods, Eqp.	3	F	(CM 3270 & ENGR 2000) or CCET 3670 or ENGR 2140
Civil Engineering Electives: Choose 6 Credits	CE 3710	Land Development Engineering	3	S-as needed	
	CE 4110	Structural Steel Design	3	S-Even	CE 3100
	CE 4120	Timber Design	3	S-Even	CE 3100
	CE 4310	Highway Planning and Design	3	S-Odd	ENGR 2010 & (MATH 1031 or 1040 or 3700)
	CE 4410	Water and Wastewater	3	S-as needed	ME 3300/05 or CM 3270 or CCET 3670
	ENGR 4900	Special Topics	1-3	**	Offered as needed
Civil Engineering Breadth courses may also be used to satisfy Civil Engineering Electives if they are not used to meet the Civil Engineering Breadth requirement.					
* May be taken concurrently					
<b>Credits to total 120 and 40 Upper Division</b>					