## **School of Engineering and Engineering Technology**

# Civil Engineering, B.S. **CIVIL ENGINEERING (BSCE)**

#### 2022-23

SUGGESTED COURSE SEQUENCE

200GE21ED COO	NSE SEQUENCE
First Semester - Fall	Second Semester - Spring
17 Hours	17 Hours
BIBL 1033 3 Biblical Literature	COSC 1303 3 Computer Science I
CHEM 1111 1 General Chemistry I Lab	CEGR 1523 3 Introduction to CEE (Spring only)
CHEM 1113 3 General Chemistry I	ENGL 1023 3 English Composition II
ENGL 1013 3 English Composition I	ENGR 1311 1 Manufacturing Processes Lab
ENGR 1513 3 Intro to Engineering Practice I (Fall only)	MATH 2013 3 Calculus II <sup>(1)</sup>
LETU 1101 1 Cornerstones of Life & Learning	PHYS 2011 1 University Physics I Lab (Spring only)
MATH 1903 3 Calculus I (1)	PHYS 2013 3 University Physics I (Spring only)
Third Semester - Fall	Fourth Semester - Spring
16 Hours	17 Hours
CEGR 2013 3 Civil Engineering Materials (Fall only)	CEGR 2502 2 CEE Project Management (Spring only)
COMM 1113 3 Intro to Speech Communication	ENGR 2400 0 Sophomore Design Seminar (Spring only)
MATH 2023 3 Calculus III	MATH 2203 3 Differential Equations
MEGR 2013 3 Statics (1)	MEGR 3323 3 Mechanics of Materials (1) (Spring only)
4 Science Elective (2)	THEO 2043 3 Biblical Theology for the Christian Life
	3 CEE Skills Elective (Spring only)
	3 Civic Engagement Elective
Fifth Semester - Fall	Sixth Semester - Spring
17 Hours	16 Hours
CEGR 3213 3 Hydraulic Analysis (Fall only)	CEGR 3913 3 Geotechnical Engineering (Spring only)
CEGR 3313 3 Structural Analysis (Fall only)	3 Biblical Engagement Elective
EVGR 3002 2 Sustainability and Stewardship (Fall only)	3 CEE Skills Elective (Spring only)
EVGR 3113 3 Environmental Engineering (Fall only)	3 CEE Engineering Science Elective
MATH 3403 3 Statistics	4 CEE Design Elective
3 Civic Engagement Elective	
Seventh Semester - Fall	Eighth Semester - Spring
14 Hours	14 Hours
CEGR 4001 1 Professional Licensing Prep (Fall only)	CEGR 4501 1 CEE Professional Practice (Spring only)
ENGR 4813 3 Senior Design I (Fall only)	ENGR 4823 3 Senior Design II (Spring only)
4 CEE Design Elective	3 CEE Engineering Science Elective
3 Ingenuity Elective	4 CEE Design Elective
3 Math or Science Elective (3)	3 Theological Engagement Elective
TOTAL HOURS 128	

- 1: Minimum grade of 'C' required.
- 2: See approved electives sheet for list of acceptable 4-hour basic science courses.
- 3: See approved electives sheet for list of acceptable 3-hour basic science or college-level mathematics courses.

### **CEE Design Elective Requirements for Optional Civil Focus Areas**

STRUCTURAL ENGINEERING FOCUS				
CEGR	4324	4	Reinforced Concrete Design	
CEGR	4834	4	Structural Steel Design	
CEGR	4944	4	Advanced Loading and Wood Design	

WATER RESOURCES ENGINEERING FOCUS						
CEGR	4224	4	Hydraulic Design			
EVGR	4634	4	Water and Wastewater Design			
CEGR	4744	4	Surface Water Hydrology			

