

BS in Civil Engineering/Civil Engineering Major Curriculum Flow Chart - Major declared Fall 2020 or later

← Pre-engineering →

Civil Major →

Term 1	Term 2	Summer	Term 3	Term 4	Term 5	Term 6	Term 7	Term 8
Total hours = 15	Total hours = 15	Total hours = 12	Total hours = 16	Total hours = 13	Total hours = 16	Total hours = 14**	Total hours = 15	Total hours = 12
<p>ENC1101 (3) or ENC 1121 (FAMU only) Pre-req: CHECK GENERAL BULLETIN</p>	<p>ENC 1102 (FAMU) ENC 2135 (FSU) or other approved Second English Pre-req: ENC 1101</p>	<p>Liberal Studies Course (3) Pre-req: CHECK GENERAL BULLETIN</p>	<p>PHY2049C OR PHY 2049/L (5) Physics II & Lab Pre-reqs: PHY 2048C, MAC 2312</p>	<p>EGM 3512 (4) Eng. Mechanics Pre-req: PHY 2048C MAC 2312 Co/pre-req. MAC 2313</p>	<p>EGN 3331 (3) Strength of Materials Pre-req: EGM 3512</p>	<p>CES 3100 (4) Structural Analysis Pre-req: EGM 3512 Co/pre-reqs: EGN 3331, MAP 2302</p>	<p>CGN 4800 (3) * Senior Design Project I Co/pre-req: CGN 3326 Senior Standing</p>	<p>CGN 4802 (3) * Senior Design Project II Pre-req: CGN 4800 Senior Standing</p>
<p>Liberal Studies Course (3) Pre-req: CHECK GENERAL BULLETIN</p>	<p>Liberal Studies Course (3) Pre-req: CHECK GENERAL BULLETIN</p>	<p>Liberal Studies Course (3) Pre-req: CHECK GENERAL BULLETIN</p>	<p>STA XXXX (3) Statistics Course GROUP D See approved course list on back page</p>	<p>CEG 2202/L (3+1) Intro to Geomat & Lab Pre-Req: MAC 2311 Course & lab must be taken same semester</p>	<p>CEG 3011 (3) Soil Mechanics Co/pre-req: EGN 3331</p>	<p>EML 3100 (2) Thermo Dynamics Pre-reqs: MAC2312, CHM 1045, PHY 2048 OR EEL 3003 (3) Intro to Electrical Eng LAB NOT REQUIRED Pre-req: MAC 2312, PHY 2049C</p>	<p>CEG 4801(3) Geotech Design Pre-req: CEG 3011 Co/pre-req: CGN3508L</p>	<p>TTE 4XXX(3) Trans. Elec OR CCE 4XXX(3) Construction Elec Pre-req: CHECK GENERAL BULLETIN</p>
<p>CHM 1045/L (4) General Chem I & Lab Pre-req: MAC 1105 Co-req: CHM 1045L</p>	<p>PHY2048C OR PHY 2048/L (5) Physics I & Lab <i>Req. to Declare Major</i> Pre-req: MAC 2311</p>	<p>Liberal Studies Course (3) Pre-req: CHECK GENERAL BULLETIN</p>	<p>MAC 2313 (5) Calculus III Pre-req: MAC 2312</p>	<p>MAP 2302 (3) ODE OR MAP 3305 (3) Eng Math Pre-req: MAC 2313 or "B" in MAC 2312</p>	<p>CGN 3326 (3) CE Graphics & Design Tools Pre-req: CEG 2202&L</p>	<p>CES 4702(3) Conc Des OR CES 4605(3) Steel Design Pre-req: EGN 3331 CES 3100 Co/Pre-req: CGN 3508L</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci See approved course list on back page</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci See approved course list on back page</p>
<p>MAC 2311 (4) Calculus I <i>Req. to Declare Major</i> Pre-req: MAC 1114 & MAC 1140 or 1147</p>	<p>MAC 2312 (4) Calculus II <i>Req. to Declare Major</i> Pre-req: MAC 2311</p>	<p>XXX XXXX (3) Science Elective GROUP A See approved course list on back page</p>	<p>EES 3040 (3) Intro.to Environmental Engineering Pre-reqs: CHM 1045&L, MAC 2311</p>	<p>EGN3613 (2) Eng. Economy Pre-req: MAC 2313</p>	<p>CWR 3201 (3) Hydraulics Pre-req: EGM 3512</p>	<p>CCE 3101 (3) Const. Materials Pre-req: EGN 3331</p>	<p>ENV 4XXX(3) Env Elec OR CWR 4XXX Wat Res Elec Pre-req: CHECK GENERAL BULLETIN</p>	<p>XXX XXXX (3) Group C Prof/Tech See approved course list on back page</p>
<p>EGN 1004L (1) First Year Eng. Lab <i>Req. to Declare Major</i> Pre-req: Must be in Pre-Eng. Major</p>		<p>DECLARE YOUR MAJOR Go to: Student Services at COE</p>			<p>TTE 3004 (3) Trans. Eng. Pre-req: STAXXXX, CEG 2202, CEG 2202L</p>	<p>CGN3508L (1) CE Materials Lab Pre-req: EGN3331 Co/pre-req: CCE 3101 or CEG 3011</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci See approved course list on back page</p>	<p>APPLY FOR GRADUATION ONLINE 2ND WEEK OF SEMESTER</p>
<p>*Capstone senior design sequence must be taken sequentially. In addition:</p> <ul style="list-style-type: none"> • CGN 3326 meets FSU's Digital Literacy requirement • CGN 4800 meets FSU's UDW & SIP requirements • CGN 4802 meets FSU's FE (Formative Experience) requirement • CGN 4800 & CGN 4802 together meet FSU's OCC (Oral Communications Competency) req. <p>**Students who take EML 3100 will complete this coursework with 127 hours. Students remain subject to the university-level requirement of 128 credit hours for graduation and will need to satisfy remaining credit hour(s) to meet 128 with additional coursework.</p>								
					<p>OPTIONAL: CHECK FOR INTERNSHIP OPPORTUNITIES AT CAREER SERVICES/COE</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci See approved course list on back page</p>	<p>SIGN UP FOR FE EXAM Go to: FBPE.ORG</p>	<p>COMPLETE DEPARTMENT & UNIVERSITY GRAD CHECKS</p>

This flowchart is a suggested academic map; Students may take any course if pre-requisite requirements are met.
See <http://eng.famu.fsu.edu/cee/undergraduate/resources> for additional pre-req and advising information.

BS in Civil Engineering/Environmental Engin. Major Curriculum Flow Chart - Major declared Fall 2020 or later

← Pre-engineering →

→ Environmental Major →

Term 1	Term 2	Summer	Term 3	Term 4	Term 5	Term 6	Term 7	Term 8
Total hours = 15	Total hours = 15	Total hours = 12	Total hours = 16	Total hours = 13	Total hours = 16	Total hours = 13**	Total hours = 16	Total hours = 12
<p>ENC1101 (3) or ENC 1121 (FAMU only)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>ENC 1102 (FAMU) ENC 2135 (FSU) or other approved Second English</p> <p>Pre-req: ENC 1101</p>	<p>Liberal Studies Course (3)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>PHY2049C OR PHY 2049/L (5) Physics II & Lab</p> <p>Pre-reqs: PHY 2048C, MAC 2312</p>	<p>EGM 3512 (4) Eng. Mechanics</p> <p>Pre-req: PHY 2048C MAC 2312 Co/pre-req. MAC 2313</p>	<p>EGN 3331 (3) Strength of Materials</p> <p>Pre-req: EGM 3512</p>	<p>ENV 4001 OR 4500 (3) Env Engineering OR Env Unit Processes</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>CGN 4800 (3) * Senior Design Project I</p> <p>Co/pre-req: CGN 3326 Senior Standing</p>	<p>CGN 4802 (3) * Senior Design Project II</p> <p>Pre-req: CGN 4800 Senior Standing</p>
<p>Liberal Studies Course (3)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>Liberal Studies Course (3)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>Liberal Studies Course (3)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>STA XXXX (3) Statistics Course</p> <p>GROUP D See approved course list on back page</p>	<p>CEG 2202/L (3+1) Intro to Geomat & Lab</p> <p>Pre-Req: MAC 2311 Course & lab must be taken same semester</p>	<p>CEG 3011 (3) Soil Mechanics</p> <p>Co/pre-req: EGN 3331</p>	<p>EML 3100 (2) Thermo Dynamics Pre-reqs: MAC2312, CHM 1045, PHY 2048</p> <p style="text-align: center;">OR</p> <p>EEL 3003 (3) Intro to Electrical Eng LAB NOT REQUIRED</p> <p>Pre-req: MAC 2312, PHY 2049C</p>	<p>CEG 4801(3) Geotech Design</p> <p>Pre-req: CEG 3011 Co/pre-req: CGN3508L</p>	<p>TTE 4XXX(3) Trans. Elec OR CCE 4XXX(3) Construction Elec</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>
<p>CHM 1045/L (4) General Chem I & Lab</p> <p>Pre-req: MAC 1105 Co-req: CHM 1045L</p>	<p>PHY2048C OR PHY 2048/L (5) Physics I & Lab <i>Req. to Declare Major</i></p> <p>Pre-req: MAC 2311</p>	<p>Liberal Studies Course (3)</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>MAC 2313 (5) Calculus III</p> <p>Pre-req: MAC 2312</p>	<p>MAP 2302 (3) ODE OR MAP 3305 (3) Eng Math</p> <p>Pre-req: MAC 2313 or "B" in MAC 2312</p>	<p>CGN 3326 (3) CE Graphics & Design Tools</p> <p>Pre-req: CEG 2202&L</p>	<p>CHM 1046/L (4) Chem II OR MCB 2004/L(4) FSU OR MCB 3005C(4) FAMU</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci</p> <p>See approved course list on back page</p>	
<p>MAC 2311 (4) Calculus I <i>Req. to Declare Major</i></p> <p>Pre-req: MAC 1114 & MAC 1140 or 1147</p>	<p>MAC 2312 (4) Calculus II <i>Req. to Declare Major</i></p> <p>Pre-req: MAC 2311</p>	<p>XXX XXXX (3) Science Elective GROUP A</p> <p>See approved course list on back page</p>	<p>EES 3040 (3) Intro.to Environmental Engineering</p> <p>Pre-reqs: CHM 1045&L, MAC 2311</p>	<p>EGN3613 (2) Eng. Economy</p> <p>Pre-req: MAC 2313</p>	<p>CWR 3201 (3) Hydraulics</p> <p>Pre-req: EGM 3512</p>	<p>CCE 3101 (3) Const. Materials</p> <p>Pre-req: EGN 3331</p>	<p>CWR 4XXX (3) Water Resources Elec</p> <p>Pre-req: CHECK GENERAL BULLETIN</p>	<p>XXX XXXX (3) Group C Prof/Tech</p> <p>See approved course list on back page</p>
<p>EGN 1004L (1) First Year Eng. Lab <i>Req. to Declare Major</i></p> <p>Pre-req: Must be in Pre-Eng. Major</p>		<p>DECLARE YOUR MAJOR Go to: Student Services at COE</p>			<p>TTE 3004 (3) Trans. Eng.</p> <p>Pre-req: STAXXXX, CEG 2202, CEG 2202L</p>	<p>CGN3508L (1) CE Materials Lab</p> <p>Pre-req: EGN3331 Co/pre-req: CCE 3101 or CEG 3011</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci</p> <p>See approved course list on back page</p>	<p>APPLY FOR GRADUATION ONLINE 2ND WEEK OF SEMESTER</p>
<p>*Capstone senior design sequence must be taken sequentially. In addition:</p> <ul style="list-style-type: none"> • CGN 3326 meets FSU's Digital Literacy requirement • CGN 4800 meets FSU's UDW & SIP requirements • CGN 4802 meets FSU's FE (Formative Experience) requirement • CGN 4800 & CGN 4802 together meet FSU's OCC (Oral Communications Competency) req. <p>**Students who take EML 3100 will complete this coursework with 127 hours. Students remain subject to the university-level requirement of 128 credit hours for graduation and will need to satisfy remaining credit hour(s) to meet 128 with additional coursework.</p>								
					<p>CWR 3200L (1) Env/Hyd Eng Lab</p> <p>Co/pre-req: CWR 3201 or EES 3040</p>	<p>XXX XXXX (3) Group B Eng/Math/Sci</p> <p>See approved course list on back page</p>	<p>SIGN UP FOR FE EXAM Go to: FBPE.ORG</p>	<p>COMPLETE DEPARTMENT & UNIVERSITY GRAD CHECKS</p>
					<p>OPTIONAL: CHECK FOR INTERNSHIP OPPORTUNITIES AT CAREER SERVICES/COE</p>			

This flowchart is a suggested academic map; Students may take any course if pre-requisite requirements are met.
See <http://eng.famu.fsu.edu/cee/undergraduate/resources> for additional pre-req and advising information.

GROUP A : Science Elective Courses (select ONE)

- **FAMU:**
 - BSC 1005 Biological Science (3)
 - BSC 1010 General Biology I (3)
 - EVR 3235 Atmospheric Processes (3)
 - GLY 2010 Principles of Geology (3)
 - PCB 2033 General Ecology (3)
 - EVR 3023 Introduction to Marine Environment (3)
 - EVS 4007 Introduction to Environmental Science (3)
- **FSU:**
 - BSC 1005 General Biology for Nonmajors (3)
 - BSC 2010 Biological Science (3)
 - MET 2700 General Meteorology (3)
 - GLY 2010C Physical Geology (4)
 - GLY 1030 Environmental Issues in Geology (3)
 - PCB 3043 General Ecology (3)
 - OCE 4008 Principles of Oceanography (3)

GROUP C: Professional/Technical Elective Courses (select ONE) A

course outside of the CEE department emphasizing professional development, computing, and other professional/technical skills.

- **COE:**
 - CGN 3145 Blending STEM and Public Policy (3)
 - EIN 4444 Technology Entrepreneurship and Commercialization (3)
- **FAMU:**
 - AGR 4430 GIS and Remote Sensing (3)
 - BCN 4705 Contract Codes & Law (3)
 - COP 3014C Fundamentals of Programming (4)
 - ENC 3243 Technical Report Writing (3)
 - GIS 1040 Intro to GIS (3)
 - POS 4697 Environmental Law (3)
- **FSU:**
 - CGS 3406 Object-Oriented Programming in C++ (3)
 - COP 3014 Programming I (3)
 - ENC 4212 Editing: Manuscripts, Documents, Reports (3)
 - GIS 2040 Essentials of Geographic Information Systems (3)
 - GIS 4043 & Lab Geographic Information Systems (3+1)
 - GIS 4330 Florida GIS Applications (3)
 - PAD 4380 Disasters: From Shock to Recovery (3)
 - URP 4710 Intro to Transportation Issues and Transportation Planning (3)

***NOTE:** Multiple special topics (4930/4936) courses may share the same course number. Make sure that you are enrolling in the correct section.

GROUP B: Math/Engineering/Science Elective Courses (select THREE)

ALL Group B courses **MAY** be from the CEE Dept. but at least **TWO** Group B courses **MUST** be from the CEE Dept.:

- **CEE Department (at least two Group B courses must come from this list):**
 - CCE 4xxx Any 4000-level CCE course not meeting another requirement
 - CEG 4xxx Any 4000-level CEG course not meeting another requirement
 - CES 4xxx Any 4000-level CES course not meeting another requirement
 - CWR 4xxx Any 4000-level CWR course not meeting another requirement
 - ENV 4xxx Any 4000-level ENV course not meeting another requirement
 - TTE 4xxx Any 4000-level TTE course not meeting another requirement
 - CGN 4930* Select 4000-level Special Topics (see Academic Coord for info)
- It is recommended that students interested in M.Eng. w/Structures take both CES 4605 and CES 4702
- **FAMU:**
 - BCN 4617 Construction Estimating I (3)
 - BCN 3253 Construction Accounting (3)
 - EVR 3028 Environmental Modeling Principles (3)
 - EVR 3867 Environmental Risk Analysis (3)
 - EVR 4027C Wetlands Preservation and Restoration (4)
 - EVS 3395 Contaminant Hydrogeology (3)
- **FSU:**
 - EOC 4631 Marine Pollution (3)
 - GLY 4451 Introduction to Geophysics (3)
 - GLY 4730 Marine Geology (3)
 - GLY 4751C Introduction to Remote Sensing, Air Photo Interpret & GIS (3)
 - GLY 4884 Environmental Geology I (3)
 - GLY 4820 Principles of Hydrology (3)
 - OCC 4060 Environmental Science Modeling (3)
 - URP 4354 International Transportation Planning (3)
- **COE:**
 - ESI 3312C Operations Research I: Deterministic (3)
 - EML 4930* Experimental Methods in Nanoscale Science & Engineering (3)

GROUP D: Statistics Courses (select ONE)

- FAMU:**
 - STA 2023 Intro to Probability and Statistics (3)
 - STA 3034 Mathematical Statistics(3)
- FSU:**
 - STA 2023 Fundamental Statistics (3)
 - STA 2122 Introduction to Applied Statistics (3)
 - STA 3032 Applied Statistics for Engineers and Scientists (3)