



Department of Civil and Architectural Engineering

## Architectural Engineering Program Curriculum

Effective Spring 2021

Fall	Spring
<b>Freshman Year</b>	
ENGL 1010 Freshman English I 3	ENGL 1020 Freshman English II 3
MATH 1910 Calculus I 4	MATH 1920 Calculus II 4
CHEM 1110 General Chemistry I 3	PHYS 2110 Calculus based Physics I 3
CHEM 1111 General Chemistry I Lab 1	PHYS 2111 Calculus based Physics I Lab 1
ENGR 1020 Freshman Engineering Seminar 1	AREN 1111 <u>Architectural Graphics</u> 2
ENGR 1151 Computer Engr Graphics 1	COMM 2200 Speech 3
UNIV 1000 Orientation 1	
<u>14</u>	<u>16</u>
<b>Sophomore Year</b>	
MATH 2110 Calculus III 4	MATH 3120 Ordinary Differential Equation 3
ENGR 2230 Engineering Programming 3	ENGR 2000 Circuits 3
ENGR 2110 Engineering Mechanics I 3	ENGR 2001 Circuits Lab 1
PHYS 2120 Calculus based Physics II 3	ENGR 2120 Engineering Mechanics II 3
PHYS 2121 Calculus based Physics II Lab 1	ENGR 2010 Thermodynamics 3
HIST 2010 American History I 3	ENGR 2130 Mechanics of Materials 3
	ENGR 2131 Mechanics of Materials Lab 1
<u>17</u>	<u>17</u>
<b>Junior Year</b>	
AREN 2300 <u>Bldg Materials &amp; Construction</u> 3	MEEN 4200 <u>Heating &amp; Air Conditioning</u> 3
AREN 3410 Bldg Structural Analysis 3	AREN 3440 <u>Steel Design</u> 3
CVEN 3100 Fluid Mechanics 3	AREN 3021 <u>Architectural Design II</u> 3
AREN 2011 <u>Architectural Design I</u> 3	AREN Technical Elective(1) 3
ENGR 3400 Numerical Analysis 3	HIST 2020 American History II 3
AREN 4430 <u>Lighting/Power Systems</u> 3	AREN 2310 Arch. History (Hum. Elect) 3
<u>18</u>	<u>18</u>
<b>Senior Year</b>	
CVEN 3400 <u>Structural Testing</u> 1	ENGR 4510 Capstone Design Project II 1
ENGR 4500 Capstone Design Project I 1	AREN 4470 <u>Construction Management</u> 3
ENGR 4900 Prof Development Seminar 1	ENGR 4201 Engineer in Training Lab 0
ENGR 4400 Probability & Statistics 3	ENGL English Literature (Hum. Elect) 3
AREN 3420 <u>Reinforced Concrete Design</u> 3	AREN Social Science Elective 3
AREN Technical Elective(1) 3	AREN Humanities Elective 3
AREN Social Science Elective 3	
<u>15</u>	<u>13</u>

ALL STUDENTS ARE REQUIRED TO PASS OR TO BE WAIVED ENGINEERING ENTRANCE EXAMINATION PRIOR TO ENROLLING IN ENGINEERING UPPER (300-400) LEVEL COURSES

SOCIAL SCIENCE and HUMANITIES ELECTIVES MUST BE CHOSEN FROM AN APPROVED LIST COURSES

(1) TECHNICAL ELECTIVES MUST BE CHOSEN BASED ON THE OPTION (MECHANICAL OR STRUCTURAL) SELECTED:  
 MECHANICAL: AREN 4220: ADVANCED MECHANICAL SYSTEMS AREN 4450: ENERGY CONSERVATION + OTHERS  
 STRUCTURAL: AREN 4440: FOUNDATION ENGINEERING AREN 3460: WOOD & MASONRY DESIGN + OTHERS

ITALIC AND UNDERLINE COURSE ONLY BE OFFERED ONCE PER YEAR IN SPECIFIED FALL OR SPRING SEMESTER

TOTAL REQUIRED CREDIT HOURS FOR DEGREE IS

128