

Degree: Environmental Science, B.S. 24-25				
Requirement Area	Course	Course Title	Prerequisites	Units
<b>First Semester (FALL)</b>				
E	SCI 130	Connecting to STEM Majors		2
A1	COMM 100	Communication		3
B1/LD Major	CHEM 111	General Chemistry I		3
B3/LD Major	CHEM 111L	General Chemistry Lab I		2
LD Major	ENSC 280	General Environmental Science		3
B4	MATH 130	Calculus I	One from the following: Satisfactory score of 78 or higher on Mathematics Placement Exam, MATH 120 or MATH 125 (either course with grade C- or better).	4
			<b>Total:</b>	17
<b>Second Semester (SPRING)</b>				
A2	ENGL 102	English Composition		3
Add'l C1 or C2	open			3
D1	open	Social Science GE elective		3
LD Major	CHEM 112	General Chemistry II	CHEM 111 with grade C- or better.	5
			<b>Total:</b>	14
<b>Third Semester (FALL)</b>				
A3	PHIL 100	Workshop in Critical Thinking		3
B2/LD Major	ENSC 240	Environmental Biology		3
C1	open	Fine Arts Elective		3
LD Major	PHYS 125	Principles of Physics I	Satisfactory score of 78 or higher on Math Proficiency Assessment or MATH 120.	4
LD Major	ENSC 241	Environmental Biology laboratory		1
			<b>Total:</b>	14
<b>Fourth Semester (SPRING)</b>				
Second Composition	ENGL 200 or PHYS 230			3
E				1
C2	open	Humanities Elective		3
Code 1/D2	open	American History elective		3
LD Major	PHYS 126	Principles of Physics II	PHYS 125.	4
LD Major	ENSC 297	Disciplinary Field course		1
			<b>Total:</b>	15
<b>Fifth Semester (FALL)</b>				
F		Ethnic Studies		3
UD-B	open	UD Science GE elective		3
LD Elective	ENSC 260	Introduction to GIS		3
LD Major	GEOL 210	Physical and Environmental Geology		4
UD Major	ENSC	Disciplinary breadth/depth elective		3
			<b>Total:</b>	16
<b>Sixth Semester (SPRING)</b>				
UWR/UD-C/Overlay	open	UD Arts/Humanities GE elective		3
UD Major	ENSC 350/GEOL 432	Env Hydrology or Hydrogeology	Either CHEM 100 or CHEM 111, and either MATH 120 or MATH 130, and either PHYS 115 or PHYS 125.	4
UD Major	STAT 303	UD Statistics	Completion of GE area B4.	3
UD Major	BIOL 350	Ecology	MATH 115, STAT 303, and either BIOL 140B or ENSC 280.	4
			<b>Total:</b>	14
<b>Seventh Semester (FALL)</b>				
Code 2	open	California History elective		3
UD-D/Overlay	open	UD Social Science GE elective		3
UD Major	ENSC 420/ENSC 414/ENSC 497	Global Change (or other UD Systems course)		3
UD Major	open, e.g. ENVT 330	UD Environmental Policy or Ethics elective		3
UD Major	ENSC	Disciplinary breadth/depth elective		3
			<b>Total:</b>	15
<b>Eighth Semester (SPRING)</b>				
UD Major	GEOL	Disciplinary breadth/depth elective		4
UD Major	ENVT 410	Environmental Impact Analysis	ENVT 310	3
UD Major	ENVT	Disciplinary breadth/depth elective		3
UD Major	ENSC 397	Advanced Field Experience	GEOL/ENSC 297 and junior or senior standing.	2
UD Major	ENSC 499	Capstone Seminar	Junior or senior standing.	3
			<b>Total:</b>	15
<b>Total Units:</b>				<b>120</b>

Note: No changes to, or from, the credit/no credit pattern are permitted after the Grade Type Change period. There are no exceptions to this rule. Courses in a student's major department, regardless of course prefix, may not be taken "CR/NC," unless that is the only grading pattern in the course.

\*Students are required to take a minimum of 40 semester units as upper division (includes 9 units upper division GE)

Updated: 4/1/2024

CSUEB General Breadth and Graduation Requirement Checklist	
<b>Area A (9 units): Communication in the English Language &amp; Critical Thinking (Must earn passing grade of C-/CR or better)</b>	
<input type="checkbox"/>	A1. COMM 100 or 104, MLL 111
<input type="checkbox"/>	A2. ENGL 101, 102, or 104
<input type="checkbox"/>	A3. PHIL 100
<b>Area B (9 units): Scientific Inquiry &amp; Quantitative Reasoning</b>	
<input type="checkbox"/>	B1. Physical Science
<input type="checkbox"/>	B2. Life Science
<input type="checkbox"/>	B3. Laboratory Activity
<input type="checkbox"/>	B4. Quantitative Reasoning (Must earn passing grade of C-/CR or better.)
<b>Area C (9 units): Arts &amp; Humanities - Minimum of two different disciplines as designated by course prefix (e.g., ART, THEA, MUS)</b>	
<input type="checkbox"/>	C1. Arts
<input type="checkbox"/>	C2. Humanities
<input type="checkbox"/>	*Additional Lower-division Area C Course in Arts (C1) or Humanities (C2)
<b>Area D (6 units): Social Sciences - Minimum of two different disciplines as designated by course prefix (e.g., ANTH, ECON, POSC)</b>	
<input type="checkbox"/>	D1.
<input type="checkbox"/>	D2.
<b>Area E (3 units): Lifelong Learning and Self-Development</b>	
<input type="checkbox"/>	E.
<b>Area F (3 units): Ethnic Studies</b>	
<input type="checkbox"/>	F.
<b>Second Composition: Requires completion of GE A2 with a C-/CR or better. Must be completed before attaining junior standing.</b>	
<input type="checkbox"/>	Second Composition
<b>University Writing Requirement</b>	
<input type="checkbox"/>	UWR
<b>U.S. Code (American Institutions Requirement) - Two courses (6 units) covering three U.S. Code Requirements of US-1 (U.S. History), US-2 (U.S. Constitution), and US-3 (California State &amp; Local Government).</b>	
<input type="checkbox"/>	Code 1.
<input type="checkbox"/>	Code 2.
<b>Upper Division GE Requirements (9 units): Should be taken after completion of A1, A2, A3, and B4 with a C- (CR)</b>	
<input type="checkbox"/>	UD-B. Upper-division Science Inquiry and Quantitative Reasoning
<input type="checkbox"/>	UD-C. Upper-division Arts OR Humanities
<input type="checkbox"/>	UD-D. Upper-division Social Sciences
<b>Overlay Requirements (9 units): Courses may be upper or lower division, and GE or major.</b>	
<input type="checkbox"/>	Diversity (Div)
<input type="checkbox"/>	Social Justice (SJ)
<input type="checkbox"/>	Sustainability (S)
<b>Elective Coursework</b>	
Only students NOT choosing the Environmental Health concentration are required to select 18-21 units of elective coursework as outlined below:	
Choose one (1) course for 3 units:	
GEOG 225 - Fundamentals of GIS Units: 3	
ENSC 260 - Introduction to GIS in Earth and Environmental Sciences Units: 3 ; G.E./G.R. Area: B1, B3	
Plus choose one (1) course for 3 units from the following:	
ENSC 414 - Hazardous Waste Management Units: 3 ; G.E./G.R. Area: Sustainability	
ENSC 420 - Global Change Units: 3 ; G.E./G.R. Area: Sustainability	
ENSC 497 - Special Topics and Issues in Environmental Sciences Units: 3	
And, choose one (1) course for 3-4 units from the following:	
ECON 360 - Environmental Economics Units: 3	
ENGL 342 - Environmental Literature Units: 4 ; G.E./G.R. Area: UD-C; Sustainability	
ENVT 330 - Environment, Sustainability, and Social Justice Units: 3 ; G.E./G.R. Area: UD-D; Sustainability	
HSC 340 - Climate Change, Health, and Equity Units: 3 ; G.E./G.R. Area: UD-D; Social Justice	
POSC 344 - Environmental Law Units: 3	
POSC 411 - Public Policy and the Environment Units: 3 ; G.E./G.R. Area: Sustainability	
SOC 330 - Environmental Sociology Units: 4 ; G.E./G.R. Area: UD-D	
Depth Electives	
Choose a minimum of 9-11 units from the following depth-electives:	
BIOL 433 - Microbial Ecology Units: 3	
BIOL 454 - Biology of Fungi Units: 4	
BIOL 469 - Conservation Biology Units: 4	
CHEM 220 - Quantitative Analysis Units: 4	
CHEM 331 - Organic Chemistry I Units: 5	
CHEM 425 - Environmental Chemistry Units: 4	
ENSC 410 - Geohealth Units: 3	
GEOG 425 - Advanced GIS Units: 3	
GEOL 311 - Geomorphology Units: 3	
GEOL 360 - Mineralogy and Optical Crystallography Units: 4	
GEOL 371 - Sedimentary Geology and Stratigraphy Units: 4	
GEOL 460 - Geographic Information Systems for Earth and Environmental Sciences Units: 4	
HSC 300 - Environmental Health Units: 3 ; G.E./G.R. Area: UD-B; Sustainability	
HSC 460 - Emergency Preparedness and Response Units: 3	
Other upper-division major-related courses may be used with prior consent of the faculty advisor.	
One ENSC graduate-level course may be used to satisfy one elective with prior consent of the faculty advisor and instructor consent.	