

# COASTAL ENVIRONMENTAL SCIENCE AND SOCIETY - BS

## Program Requirements

### First Year

Fall		Semester Credit Hours
BIOL 111	Introductory Biology I	4
ENGL 104	Composition and Rhetoric	3
GEOL 101 & GEOL 102	Principles of Geology and Principles of Geology Laboratory	4
MARS 101	Marine Science Matters <sup>1</sup>	1
MATH 150	Functions, Trigonometry and Linear Systems	4
Semester Credit Hours		16

### Spring

BIOL 112 or GEOL 106	Introductory Biology II or Historical Geology	4
MATH 147	Calculus I for Biological Sciences	4
OCNG 251 & MARS 252	Oceanography and Introductory Marine Science Laboratory <sup>1</sup>	4
POLS 207	State and Local Government	3
Semester Credit Hours		15

### Second Year

Fall		Semester Credit Hours
CHEM 119	Fundamentals of Chemistry I	4
ECON 202	Principles of Economics	3
MARS 280	Coastal and Ocean Resources <sup>1,2</sup>	3
MARS 281	Sophomore Seminar in Marine Sciences <sup>1</sup>	1
Select one of the following:		4
PHYS 201	College Physics	
PHYS 206 & PHYS 226	Newtonian Mechanics for Engineering and Science and Physics of Motion Laboratory for the Sciences	
Semester Credit Hours		15

### Spring

CHEM 120	Fundamentals of Chemistry II	4
COMM 203	Public Speaking	3
ECON 203	Principles of Economics	3
MARS 210	Marine Geography <sup>1</sup>	3
American history ( <a href="http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#american-history">http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#american-history</a> )		3
Semester Credit Hours		16

### Third Year

Fall		Semester Credit Hours
MARA 363	The Management Process	3
MARS 350	Advanced Computer Applications <sup>1</sup>	2
OCNG 420	Biological Oceanography <sup>1</sup>	3

American history (<http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#american-history>) 3

Professional electives <sup>1,3</sup> 3

Semester Credit Hours 14

### Spring

MARS 310	Field Methods in Marine Sciences <sup>1,4</sup>	3
POLS 206	American National Government	3
STAT 303	Statistical Methods	3
Creative arts ( <a href="http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#creative-arts">http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#creative-arts</a> )		3
Professional elective <sup>1,3</sup>		3
Semester Credit Hours		15

### Fourth Year

Fall		Semester Credit Hours
MARS 325	Introduction to GIS for Marine Sciences <sup>1</sup>	3
MARS 491	Research in Marine Sciences <sup>1</sup>	1
POLS 347 or MARS 432	Politics of Energy and the Environment or Peak Oil, Global Warming and Resource Scarcity	3
Select one from: <sup>1</sup>		4
MARB 430	Coastal Plant Ecology	
MARS 425 & MARS 426	Coastal Wetlands Management and Coastal Wetlands Delineation Laboratory	
Professional elective <sup>1,3</sup>		3
Semester Credit Hours		14

### Spring

MARS 481	Seminar	1
MARS 430 or MARS 431	Geological Oceanography-Plate Tectonics <sup>1,5</sup> or Geological Oceanography-Earth's Climate	3
Language, philosophy and culture ( <a href="http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#language-philosophy-culture">http://catalog.tamu.edu/undergraduate/general-information/university-core-curriculum/#language-philosophy-culture</a> )		3
Professional elective <sup>1,3</sup>		6
General elective		2
Semester Credit Hours		15
Total Semester Credit Hours		120

All electives must be chosen in consultation with, and approved by, the student's academic advisor. Unless courses are specifically listed, see University Core Curriculum at <http://core.tamu.edu/> for a listing of course options for Communication, Mathematics, Life and Physical Sciences, Language Philosophy and Culture, Creative Arts, American History, Government and Political Sciences and Social and Behavioral Sciences. The 3-hour University Core Curriculum requirement for International and Cultural Diversity and the 3 hour requirement for Cultural Diversity may be met with courses used to satisfy other degree requirements.

<sup>1</sup> Indicates required courses in the Ocean and Coastal Resources major. These courses will be used to compute the major GPR. Also, if any upper level MARS or OCNG elective courses are taken, they will be used in the major GPR.

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<sup>2</sup> The total hours may be increased if the student is required to take remedial math, remedial English, foreign language or the 3-hour University Core Curriculum requirement for International and Cultural Diversity and the 3 hour requirement for Cultural Diversity.

<sup>3</sup> Recommended professional electives include, but are not limited to: CHEM 316, CHEM 318, MARA 470, MARB 320, MARB 340, MARB 423, MARB 438, MARB 445, MARS 305, MARS 306, MARS 330, MARS 370/GEOG 370, MARS 410, MARS 412, MARS 415, MARS 423, MARS 435, MARS 440, MARS 484, MARS 491 or MARS 489.

<sup>4</sup> Field Experience may also be met with MARB 300 plus one credit hour of a field oriented lab course.

<sup>5</sup> Designated writing intensive course. If both MARS 430 and MARS 431 are taken, one can be used as a professional elective.