OCEANOGRAPHY – OCEAN

Charles Ramos, Dean
Sciences Division
Physical Sciences Building, Room 263

Possible career opportunities

The diverse range of subjects examined and the multi-disciplinary approach taken within the oceanography program prepares students for a variety of career paths. Courses focus on biological, physical, geological and chemical aspects of oceanography. Many oceanographers are employed as researchers and/or educators by public and private research institutions, universities, and colleges. Students graduating with degrees in oceanography or aquatic science fields may work as laboratory or field technicians; water monitoring specialists; for environmental protection, consulting and nonprofit firms; as observers aboard fishing vessels; or in the natural resource management fields. Limited numbers are employed to work with marine animals at aquariums, theme parks, or research facilities. Most career options are likely to require more than two years of college study.

OCEAN-101 Fundamentals of Oceanography

3 units SC

- *IGETC: 5A; CSU GE: B1; DVC GE: II*
- *54 hours lecture per term*
- *Advisory: College-level reading and writing are expected.*
- *Note: This course does not include a laboratory. Students requiring or wanting a laboratory to accompany this course should enroll in OCEAN 102. Students who have successfully completed OCEAN-102 should not enroll in OCEAN-101. Students who have successfully completed OCEAN-102 will not receive credit for OCEAN-101.*

This course is an introduction to the geological, chemical, physical and biological aspects of the worldís oceans and interactions of these different aspects. Topics include the history of oceanography; historic and modern oceanographic instruments; plate tectonics and marine geology; the marine-land interface; ecological problems of the local bay, estuary, delta and state-wide water resources; the oceans' roles as a dominant influence on the earth, its climate, and the lives of its inhabitants; food, drug, and mineral energy resources from the sea; global and local ocean resource management, aquacultural techniques and practices; preservation of marine environments; and the deep sea, its properties, animals and their adaptations. CSU, UC (credit limits may apply to UC - see counselor)

OCEAN-102 Fundamentals of Oceanography with Laboratory

4 units SC

- *IGETC: 5A, 5C; CSU GE: B1, B3; DVC GE: II*
- *54 hours lecture/54 hours laboratory per term*
- *Advisory: College-level reading and writing are expected.*
- *Note: Students who have successfully completed OCEAN-101 should not enroll in OCEAN-102. Students who have successfully completed OCEAN-101 will not receive credit for OCEAN-102.*

This course is an introduction to the geological, chemical, physical and biological aspects of the worldís oceans and the interactions of these different aspects. Topics include: the history of oceanography; historic and modern oceanographic instruments; plate tectonics and marine geology; the marine-land interface; ecological problems of the local bay, estuary, delta and state-wide water resources; the oceans' roles as a dominant influence on the earth, its climate, and the lives of its inhabitants; food, drug, mineral and energy resources from the sea; global and local ocean resource management, aquacultural techniques and practices; preservation of marine environments; and the deep sea, its properties, animals and their adaptations. In the laboratory, students will explore the role of the oceanographer as they learn about methods for collecting data and analyze data collected from ocean environments. CSU, UC (credit limits may apply to UC - see counselor)

OCEAN-150 Topics in Oceanography

.3-4 units SC

- *Variable hours*

A supplemental course in oceanography to provide a study of current concepts and problems in oceanography and related subdivisions. Specific topics will be announced in the schedule of classes. CSU

OCEAN-299 Student Instructional Assistant

.5-3 units SC

- *Variable hours*
- *Note: Applications must be approved through the Instruction Office. Students must be supervised by a DVC instructor.*

Students work as instructional assistants, lab assistants and research assistants in this department. The instructional assistants function as group discussion leaders, meet and assist students with problems and projects, or help instructors by setting up laboratory or demonstration apparatus. Students may not assist in course sections in which they are currently enrolled. CSU