The Department of Anthropology/Geography offers a major and minor in Geography, as well as an optional concentration in Applied Geography and a Geography concentration for the Liberal Studies and Social Sciences major. In addition, Geography offers courses for the minor in Environmental and Resource Studies, International Studies (SSCI), and Urban and Community Studies (SSCI). Courses are open to all students interested in gaining a better understanding of the world in which they live.

Geography studies Earth’s varied environments and the patterns and interrelationships resulting from human interaction with them. A major goal of the department is to provide students with meaningful knowledge of the world’s cultures in their different physical settings.

The Department of Anthropology/Geography strongly supports field and international educational experiences and encourages students to investigate opportunities for fieldwork and overseas study. Certain courses offered at CSU International Programs study centers abroad are equivalent to courses in the Department of Anthropology/Geography and may be used to fulfill requirements for degree options offered by the Department and/or certain general education requirements. Students should consult the International Programs Bulletin available from the Office of Global Affairs located in the Classroom Building, then discuss the possibilities with a departmental adviser.

CAREER OPPORTUNITIES
Opportunities for students with a degree in geography include careers in city or regional planning, land use and environmental planning, park rangers, map making, geographic information systems analysts (utilizing computer software), teaching, and others. Students should discuss career opportunities in geography with a geography adviser.
Bachelor of Arts, Geography

Requirements
1. Complete University requirements for the Bachelor of Arts degree (51 units minimum).
2. Complete the following prerequisites to the major (6 units):
   a. GEOG 2010 Introduction to the Natural Environment, 3 units
   b. Complete one of the following:
      GEOG 2020 Introduction to Cultural Geography, 3 units
      GEOG 4200 World Regional Geography I, 3 units
      GEOG 4210 World Regional Geography II, 3 units

Note: Completion of MDIS 2000, Library Resources, 2 units, is recommended but not required.
3. Complete the major of not less than 36 upper-division units as approved by the major adviser. Four units of CR-graded course work in courses graded exclusively CR/NC may apply toward the major.
4. Completion of a minor is recommended but not required.
Note: Students are expected to take additional courses in supporting fields that relate to their career interests. See adviser for further information.

The Major
(36 units minimum)
1. Complete 36 units of course work as follows:
   a. Topical Human Geography (10 units minimum):
      i. GEOG 3010 Cultural Geography or its equivalent, 3 units
   b. Topical Physical Geography (6 units):
      Complete the following two courses:
      GEOG 3100 Climatology, 3 units
      GEOG 4120 Geomorphology, 3 units
   c. Regional Geography (6 units minimum):
      Complete two of the following courses:
      GEOG 3350 Geography of the Great Central Valley, 3 units
      GEOG 3510 Geography of North America, 3 units
      GEOG 3550 Geography of Europe, 3 units
      GEOG 3570 Geography of Russia and East Europe, 3 units
      GEOG 3580 Cultural Ecology of Southeast Asian Peoples, 4 units
      GEOG 4250 The Ethnociology of Southeast Asia, 4 units
   d. Methodology (6 units minimum):
      Complete two of the following courses:
      GEOG 3700 Cartography, 3 units
      GEOG 4700 Geographical Processes in Arid Landscapes: Death Valley, 4 units
      GEOG 4710 Field Methods, 3 units
      GEOG 4750 Geographic Information Systems, 3 units
   e. Upper-division Electives
      Select electives to complete a total of at least 36 units, including those upper-division units listed above.

Applied Geography Concentration
(36 units)
This concentration is designed to provide a core of geography courses which have a practical application in careers in computer mapping, city planning, public administration, or resource management.
1. Complete the prerequisites to the major (6 units).
2. Complete the following required methodology courses (12 units):
   a. GEOG 3700 Cartography, 3 units
   b. GEOG 3750 Introduction to Computer Applications in Geography, 3 units
   c. GEOG 4301 Permaculture Applications in Diverse Environments, 3 units
   d. GEOG 4710 Field Methods (WP), 3 units
3. Complete a minimum of 6 units from the following applied courses:
   a. GEOG 4700 Geographical Processes in Arid Landscapes: Death Valley, 4 units
   b. GEOG 4730 Computer Applications in Geography, 1-3 units
   c. GEOG 4750 Geographic Information Systems, 3 units
   d. GEOG 4930 Planning Issues, 1-2 units
4. Complete the following as per advisement (18 units):
   a. Six units of Physical Geography
   b. Three units of Regional Geography
   c. Six units of Human Geography
   d. Three units of upper-Division Geography Electives

The Minor
Requirements (18 units)
Complete 18 semester units approved by the minor adviser, including at least 15 units in upper-division courses. These upper-division units must include a minimum of one course from each of the following three categories:
1. Human Geography
2. Physical Geography
3. Regional Geography

Note: See the department for further information.

Liberal Studies Concentration
Liberal Studies majors who wish to take their concentration in geography are to complete a minimum of 20 units, including at least 15 units of upper-division courses.

Requirements (20 units)
1. Complete two of the following courses (6 units):
   a. GEOG 2010 Introduction to the Natural Environment, 3 units
   b. GEOG 2400 World Regional Geography I, 3 units
   c. GEOG 2410 World Regional Geography II, 3 units
2. Complete the following courses (6 units):
   a. GEOG 3010 Cultural Geography, 3 units
   b. GEOG 3020 Human Ecology, 3 units
   c. GEOG 3020 Geographical Processes in Arid Landscapes: Death Valley, 4 units
3. Complete the following regional course (3 units):
   a. GEOG 3510 Geography of North America, 3 units
   b. GEOG 3550 Geography of Europe, 3 units
   c. GEOG 3570 Geography of Russia and East Europe, 3 units
4. Complete additional units in geography (5 units), based on interest and career goals.

Teaching Credentials
Majors in geography interested in a single subject teaching credential should review the Social Sciences Subject Matter Preparation Program in this catalog. Please refer to the "College of Education, Teacher Education” section of this catalog for a description of other requirements to be completed for the single subject credential.
Course Descriptions

Lower Division

GEOG 2010 Introduction to the Natural Environment (3 units).
Analysis of the distribution and character of major aspects of the natural environment, including weather, climate, landforms, soils, vegetation, and their significance and meaning to humans; humankind's impact on and use of these elements. Satisfies G.E. area D2. (CAN GEOG 2) (Fall, Spring)

GEOG 2020 Introduction to Cultural Geography (3 units).
A broad based geographical survey of major components of human culture, including forms of livelihood, religion, and language. An introduction to themes in the study of folk culture, popular culture, and settlement patterns. Satisfies G.E. areas D2 and G. (CAN GEOG 4)

GEOG 2400 World Regional Geography I: Europe and Asia (3 units).
(Formerly World Regional Geography) A regional analysis of Europe and Asia examining the spatial patterns of physical and human phenomena. Includes consideration of physical, cultural, historical, economic, and demographic characteristics. Satisfies G.E. area D2.

GEOG 2410 World Regional Geography II: Africa, Australia, and Latin America (3 units).
A regional analysis of Africa, Australia, and Latin America, examining the spatial patterns of physical and human phenomena. Includes consideration of physical, cultural, historical, economic, and demographic characteristics. Satisfies G.E. area D2.

Upper Division

GEOG 3010 Cultural Geography (3 units).
Study of the spatial variety and patterns in human cultures and an analysis of the processes of cultural change. Topics include agriculture, land use, religion, migrations, ethnic minorities, and language. Satisfies G.E. area G. Prerequisite: Junior standing. (Fall)

GEOG 3020 Human Ecology (3 units).
Study of environmental problems arising from human use of the earth's resources. Topics include population dynamics, natural resource management, land use, coastal preservation, energy resources, and humankind's relationship to nature. Satisfies G.E. area F3. (Fall, Spring)

GEOG 3100 Climatology (3 units).
The elements and controls of weather and climate; analysis of climatic regions of the world. Prerequisite: GEOG 2010 or consent of instructor.

GEOG 3300 Geography of Economic Activities (3 units).
Study of world economic activity from a geographic point of view; systematic analysis of agricultural, mining, and manufacturing patterns in the various regions of the world in relation to their natural and cultural settings. Considers locational determinants of human economic activities. Prerequisite: Junior standing or consent of instructor. (Normally offered alternate years)

GEOG 3340 California Cultures and Environments (3 units).
Considers California's diverse natural regions and patterns in which these environments were occupied successively by native Americans, Hispanics, and later Americans. Studies modern California life, including the role and contributions of ethnic minorities, as well as demographic and environmental issues. Satisfies G.E. area F3. (Fall)

GEOG 3350 Geography of the Great Central Valley (3 units).
Focuses on the character and complexity of the Great Central Valley by analyzing its physical environment, its people, and their relationship with both the land they occupy and the world beyond. Designed specifically for future teachers. (LIBS Integrative: Social Inquiry)

GEOG 3510 Geography of North America (3 units).
A survey of the physical geography, resources, agriculture, industry, transportation, and urbanization. Prerequisite: Junior standing or consent of instructor. (Spring)

GEOG 3550 Geography of Europe (3 units).
The regional geography of Europe, with emphasis on present-day patterns. Prerequisite: Junior standing or consent of instructor. (Fall)

GEOG 3570 Geography of Russia and East Europe (3 units).
A survey of the physical geography, resources, agriculture, industry, people, potential, and problems of Russia and the East European countries. Prerequisite: Junior standing or consent of instructor.

GEOG 3580 Cultural Ecology of Southeast Asian Peoples (4 units).
(Replaces GEOG 3590) Examines the cultures of Southeast Asia and their life styles emphasizing complex interrelations between cultures and their environments. Includes migration and acculturation issues related to Indochinese refugees. Satisfies G.E. area G.

GEOG 3650 Selected Topics in Regional Geography (1–3 units).
Regional emphasis or topic varies each semester. Course may be repeated. Prerequisite: Junior standing or consent of instructor.

GEOG 3700 Cartography (3 units).
Introduction to thematic cartography; fundamentals of map reading and cartographic portrayal including map design, compilation, drafting, and reproduction. Corequisite: GEOG 3702. Prerequisite: Three units of geography or consent of instructor. (Lecture, 2 hours; laboratory, 2 hours)

GEOG 3751 Introduction to Computer Applications in Geography (3 units).
Introduces computer systems and programs used in geographic research. Students will utilize systems and programs through the context of a class-wide geographic research problem. Corequisite: GEOG 3752. (Lecture, 2 hours; laboratory, 2 hours)
GEOG 3930 Historical Geography of the Central Mother Lode (1 unit).
An individually-paced, two-day field trip which involves following a trip guide to sites in and around the communities of Jamestown, Sonora, Columbia, Angels Camp, Murphys, Jackson, Volcano, Sutter Creek, Amador City, and Fiddletown. At each site, students are directed to play recorded lectures on topics ranging from early gold mines, mining methods, mining towns, local history, geography, and geology. (Fall, Spring, Summer)

GEOG 3940 Geography of the Sacramento-San Joaquin Delta (1 unit).
An individually-paced, two-day field trip in the Sacramento-San Joaquin Delta. Videos and a detailed route notebook will guide students in a study of Delta physical and cultural patterns.

GEOG 3950 Historical Geography of the Northern Mother Lode (1 unit).
An individually-paced, two-day field trip which involves following a trip guide to sites in and around the communities of Folsom, Coloma, Grass Valley, Nevada City, and North Bloomfield. At each site, students are directed to play recorded lectures on topics ranging from early gold mines, mining methods, mining towns, local history, geography, and geology. (Fall, Spring, Summer)

GEOG 3960 The Yosemite Region (1 unit).
Individually paced field trip of Yosemite National Park and its setting. Topics covered include geology, park history, environmental concerns, and park management. Course involves following an itinerary using a guide book, maps, and taped discussions which are played in the field at designated locations. Takes two to three days depending on student travel plans. Student arranges own departure/return dates and own transportation.

GEOG 4000 Current Trends in Geography (1-2 units).
A symposium on geography featuring speakers on their special areas of research, including current theories and research approaches in geography. Topics differ each term. May be repeated for no more than 4 units of credit towards the major. Prerequisite: One lower-division geography class or consent of instructor.

GEOG 4050 Restorative Human Ecology (3 units).
A study of current approaches to restore human environmental balance for sustainability and environmental, community, and human health. Includes examination of the ethnoecology of several indigenous cultures. Satisfies G.E. areas F3 and G. One of three cluster courses in the G.E. Summit Program (Waking up to Nature: Ethics, Ecology, and Restoration Practices). Prerequisite: Consent of Summit Program Coordinator.

GEOG 4070 Agricultural Geography (4 units).
(Formerly GEOG 3070) Examines a variety of agricultural systems in the world from an agro-ecological approach. The natural resources and cultural factors which interact to shape and change agricultural systems are studied in detail. Prerequisite: One course in physical geography.

GEOG 4120 Geomorphology (3 units).
(Formerly GEOG 3120) Study and interpretation of the Earth’s natural landforms; their distribution and the processes acting on them; includes consideration of landform evolution under varied climatic regimes. Prerequisite: GEOG 2010 or equivalent course in physical geography or consent of instructor.

GEOG 4210 Geographic Problems in the Developing World (3 units).
Analysis of natural and cultural conditions pertinent to development. Consideration of the role of geography in solution of development problems. Prerequisite: An introductory course in geography.

GEOG 4250 The Ethnoecology of Southeast Asia (4 units).
(Same as ANTH 4250) Drawing on case studies from Island and Mainland Southeast Asia (including southern China), this course explores the long history of human-environmental interaction in the region. Examines the causes of stress and instability in that interaction and the attempts to restore viable relationships and systems. Prerequisite: Senior standing or consent of instructor.

GEOG 4301 Permaculture Applications in Diverse Environments (3 units).
(Formerly Geography and Environmental Planning) Examines permaculture approaches in humid tropics/subtropics, arid and semi-arid regions, mountain/cold climates, and urban areas. Prerequisite: Introductory physical geography course or consent of instructor.

GEOG 4350 Urban Geography (4 units).
Study of the spatial aspects of the city. Emphasis on the relationship of cities to each other and to the countryside, as well as on the internal structure and spatial dynamics of urban centers. Special consideration given to problems of the urban environment including urban sprawl, water and recreational needs, and controls of land use. Field trips may be required. Prerequisite: Junior standing or consent of instructor. (Spring)

GEOG 4380 Historical Geography of the United States (3 units).
A study of the evolution of cultural landscapes in the United States. Emphasis on initial and sequential settlement patterns, routes of diffusion and migration, and use of resources in light of cultural traditions. Comparative analysis of regional differences in material folk culture. Prerequisite: Junior standing or consent of instructor.

GEOG 4450 Seminar in Geography (1–3 units).
Topic or emphasis varies each semester; course may be repeated. Prerequisite: Six units of geography or consent of instructor.

GEOG 4700 Geographical Processes in Arid Landscapes: Death Valley (4 units).
Using field techniques in geography, the course analyzes geomorphic processes, climate characteristics, vegetation patterns and adaptations, and human impacts in an arid environment. Course is taught in Death Valley and is offered only winter term. Corequisites: GEOG 4703. Prerequisites: A course in physical geography and consent of instructor. (Lecture, 1 hour; activity, 6 hours)
GEOG 4710 Field Methods (WP) (3 units).
Methods of field observation; techniques of data collection and analysis; field work and report writing required. Satisfies upper division writing proficiency requirement. Corequisite: GEOG 4713. Prerequisite: Completion of the Writing Proficiency Screening Test with a passing score. Six units in geography or consent of instructor. (Lecture, 2 hours; activity, 2 hours) (Fall)

GEOG 4720 Local Field Excursions (1 unit).
Provides students with directed field experiences, involving travel to and study of areas of special geographic significance such as Yosemite, Point Reyes, Mono Lake, and others. May be repeated to various destinations. Prerequisite: Consent of instructor.

GEOG 4730 Computer Applications in Geography (1–3 units).
A tutorial course for self-motivated students familiar with computer programs. Students will learn mapping techniques and geographic information systems from available software. Prerequisites: Consent of instructor and knowledge of cartography.

GEOG 4750 Geographic Information Systems (3 units).
The use of computers for input, storage, representation, analysis, and retrieval of spatial data for cartographic purposes; GIS as a tool in information management and decision making. Corequisite: GEOG 4752. Prerequisites: Consent of instructor and computer experience. (Lecture, 2 hours; laboratory, 2 hours)

GEOG 4800 Survey of Geographic Thought and Literature (3 units).
Survey of the history and philosophy of geography, its place among the sciences and social sciences, and the major contributors to the development of modern scientific geography. Prerequisite: Consent of instructor.

GEOG 4900 Directed Field Research (1–5 units).
Field research conducted in any subdiscipline of geography under the direction of a specific faculty member. May be repeated for a total of 6 units. Prerequisite: Junior standing and consent of instructor.

GEOG 4910 Cooperative Education (2–4 units).
Provides an opportunity to acquire relevant, practical experience in supervised paid employment within the discipline. Students serve in private or public sector positions under the supervision of the employer and Department Co-op Coordinator. May be repeated for a total of 6 units. Prerequisite: Sophomore standing and consent of departmental coordinator. (Fall, Winter, Spring)

GEOG 4930 Planning Issues (1–2 units).
On an individual basis, students will attend a selection of urban and/or county planning meetings during one term and develop reports related to issues discussed. Must provide own transportation. Prerequisite: Consent of instructor.

GEOG 4940 Internship in Geography (1–6 units).
Designed for students who are serving as interns in public or private agencies. Students serve internship as arranged between the agency and the department. Prerequisites: Nine upper-division units in geography and consent of instructor.

GEOG 4950 Selected Topics in Geography (Topics to be specified in Class Schedule) (1–5 units).
Topics vary each term, thus different topics may be taken for credit. Prerequisite: Consent of instructor.

GEOG 4980 Individual Study (1–4 units).
For students capable of independent work and in need of advanced and specialized study. May be repeated for a total of 6 units. Prerequisite: Consent of instructor.

GEOG 4990 Senior Thesis (3 units).
Senior thesis (a research topic to be agreed upon by the student and major professor). Geographic research and writing incorporating primary sources of data and geographic methods. Prerequisites: Senior standing, advanced course work in geography, and consent of instructor.

Postbaccalaureate

GEOG 5250 The Ethnecology of Southeast Asia (4 units).
(Same as ANTH 5250) Drawing on case studies from Island and Mainland Southeast Asia (including southern China) this course explores the long history of human-environmental interaction in the region. We examine the causes of stress and instability in that interaction and the attempts to restore viable relationships and systems. Prerequisite: Graduate standing or consent of instructor.

GEOG 5800 Seminar in the Development of Geographic Thought (3 units).
Seminar in the history and philosophy of geography, its place among the sciences and humanities, and the major contributors to the development of modern scientific geography. Prerequisites: Graduate standing and consent of instructor.

GEOG 5850 Seminar in Graduate Research (2 units).
Considers the techniques used, problems encountered, and results of the current research of graduate students. May be repeated once for credit. Prerequisites: Graduate standing and consent of instructor.

GEOG 5900 Directed Field Research (1–5 units).
Field research conducted in a subdiscipline of geography under the direction of a specific faculty member. May be repeated for a total of 6 units. Prerequisite: Consent of instructor. Available only for postbaccalaureate credit.

GEOG 5940 Internship in Geography (1–6 units).
Designed for postbaccalaureate or graduate students who are serving as interns in public or private agencies. Students serve internship as arranged between the agency and the department. Prerequisites: Graduate standing and consent of instructor.

GEOG 5950 Selected Topics in Geography (1–5 units). (Topics to be specified in Schedule of Classes.) Innovative course of study in seminar format. Topics vary. Different topics may be taken for credit. Available only for postbaccalaureate credit. Prerequisite: Consent of instructor.

GEOG 5980 Individual Study (1–4 units).
Individual study for qualified postbaccalaureate students in need of advanced and specialized study. May be repeated for a total of 6 units. Prerequisite: Consent of instructor.

GEOG 5990 Thesis (3–6 units).
Thesis research. May be repeated for a total of 6 units. Prerequisite: Consent of graduate adviser.