Geography

Professors Dunn, Kebbede (chair), McMenamin (on leave 2015-16), Millette, Werner; Associate Professor Markley; Assistant Professor Houston.

Overview

The geography major is intended to provide students with an understanding of the world around them in its physical, spatial, and human dimensions. Central to the discipline is the study of interactions of humans and environmental systems. Specific topics emphasized in the curriculum include the physical environment, urban and political geography, resource conflict, socioeconomic development, and techniques in geographic data analysis (computer mapping, satellite image analysis, and geographic information systems).

Contact Info

Girma Kebbede, chair
Cecile Vasquez, senior administrative assistant

Requirements for the Major

Credits

- A minimum of 36 credits

Courses

- Geography 105, World Regional Geography and
- Geography 107, Introduction to the Physical Environment
- Any four of the following 200-level thematic and regional courses:
  - Geography 202, Cities in a Global Context
  - Geology 203, Surface Processes
  - Geography 204 (Environmental Studies 204) Human Dimensions of Environmental Change
  - Geography 205, Mapping and Spatial Analysis
  - Geography 206, Political Geography
  - Geography 208, Global Movements: Migrations, Refugees, and Diasporas
  - Geography 210, GIS for the Social Sciences
  - Geography 215, The Political Economy of the Middle East and North Africa
  - Geography 217, The African Environments
  - Environmental Studies 222, Evolution of North American Landscapes
  - Geography 230, Environmental Soil Science
  - Geography 295, Independent Study
- Any three 300-level courses, selected from the following:
  - Geography 304, Planning and the Environment – Special Topics
  - Geography 311 and 312, Seminars: Selected Topics
  - Geography 313, Third World Development
  - Geography 319, Africa: Problems and Prospects
  - Geography 320, Research with Geospatial Technologies
  - Geography 395, Independent Study

Most geography courses are offered in alternate years, and majors should consult the department when planning their programs.

Requirements for the Minor

Credits

- A minimum of 20 credits

Courses

- Geography 105, World Regional Geography
- Any three of the 200-level thematic and regional courses approved for the major. (See major requirements for list.)
- Any one of the 300-level courses approved for the major. (See major requirements for list.)

Course Offerings

GEOG-105 World Regional Geography

Fall and Spring

This course surveys the major geographic regions of the world in terms of environmental features and resource distributions, economic mainstays, population characteristics, cultural processes, social relationships, and patterns of urbanization and industrial growth. In addition to these topical foci, we use various sub-fields of geography to animate different regions. This approach provides a sense of depth while we also pursue a breadth of knowledge about the world.

Applies to requirement(s): Social Sciences; Multicultural Perspectives

S. Houston

Credits: 4

GEOG-107 Introduction to the Physical Environment

Fall

A systematic introduction to the processes operating on the surface of the earth, their spatial variation and their contribution to the spatial patterning of life on earth. The course stresses interactions among the earth's energy balance, weather, ecological resources and human impacts on environmental systems.

Applies to requirement(s): Math & Sciences

T. Millette

Credits: 4

GEOG-202 Cities in A Global Context

Spring

Cities are dynamic landscapes informed by myriad economic, political, social, environmental, and cultural processes. This course delves into the forces of urbanization and examines how cities have been investigated, built, experienced, and lived in throughout history and around the globe. By accenting a geographic perspective and drawing upon an array of theoretical ideas and empirical examples, this class grapples with the fascinating complexities of the urban context.

Applies to requirement(s): Social Sciences; Multicultural Perspectives

S. Houston

Credits: 4

GEOG-205 Mapping and Spatial Analysis

Spring

Provides a comprehensive introduction to maps, including their design, compilation, and computer production. Introduces students to the principles of abstracting the Earth's surface into spatial databases using GIS, remote sensing, and Global Positioning Satellites.

Applies to requirement(s): Meets No Distribution Requirement

T. Millette

Credits: 4

GEOG-206 Political Geography

Spring

Systematically studies political phenomena and their geographic expression, at a variety of spatial scales - national, regional, and international. Major themes
include nation-state formation, boundary, territory, and ethnic issues, regional blocs and spheres of influence, and conflicts over access to and use of resources. 

Applies to requirement(s): Social Sciences

G. Kebbede

Credits: 4

GEOG-208 Global Movements: Migrations, Refugees and Diasporas

Fall
The voluntary and involuntary movement of people around the globe is the focus of this course on migrations, refugees, and diasporas. Questions of borders, nativism, transnationalism, the global economy, and legality thread through this course as we consider the many social, cultural, environmental, economic, and political factors shaping decisions to leave a home or homeland. Historical and contemporary case studies, compelling theoretical texts, and geographic perspectives on these topics collectively animate our discussions. 

Applies to requirement(s): Social Sciences; Multicultural Perspectives

S. Houston

Credits: 4

GEOG-210 GIS for the Social Sciences and Humanities

Fall
This course introduces the use of Geographic Information Systems (GIS) and other geospatial technologies in the social sciences and the humanities. The student will learn to collect, process, and analyze quantitative data within the spatial (geographic) context where they occur. Course content may include research topics from current faculty. 

Applies to requirement(s): Meets No Distribution Requirement

E. Marcano

Advisory: Proficiency with computers and quantitative data analysis

Credits: 4

GEOG-215 The Political Economy of the Middle East and North Africa

Not Scheduled for This Year
In this course, the Middle East and North Africa are studied in terms of their physical, cultural, economic, and political geography. Emphasis is placed on the environmental conditions and ecological evolution, population and demographic characteristics, the resource base and major problems in the social, political, and economic transformation of the region. 

Applies to requirement(s): Social Sciences

G. Kebbede

Credits: 4

GEOG-217 The African Environments

Fall
The course provides an integrated analysis of biogeography, environmental change, and hydrology within each of the biomes found in the African continent: forest, savanna, desert, coast, wetland, mountain, and Mediterranean environments. It also discusses the impact and significance of human activity on African environments by exploring debates about land degradation, climate change, biodiversity and depletion, and conservation and development. 

Applies to requirement(s): Social Sciences; Multicultural Perspectives

G. Kebbede

Credits: 4

GEOG-230 Environmental Soil Science

Spring
Introduction to the physical, chemical, and biological properties of soils and their relationship to environmental quality, agricultural production, and land management. This course will also describe the processes of origin and development of soils as natural entities and how they affect the different ecosystems where they are located. Some field work required. 

Applies to requirement(s): Meets No Distribution Requirement

E. Marcano

Prereq: Any 100 or 200 level science course or Geography 107.

Credits: 4

GEOG-295 Independent Study

Fall and Spring
The department
Instructor permission required.

Credits: 1-4

Course can be repeated for credit.

GEOG-304 Planning and the Environment - Special Topics

GEOG-304UP Planning and the Environment - Special Topics: 'Urban Planning'

Fall
This course examines in detail the fabric of urban and suburban settlement and commerce in the pre and post WW-II U.S. Field trips to the greater Springfield area are used to allow students to develop firsthand understanding of interactions between urban and suburban areas and to recognize the major changes to the human landscape driven by suburbanization and urban abandonment. This class will examine the section of Springfield slated for the MGM Casino Development. 

Applies to requirement(s): Social Sciences

T. Millette

Prereq: Any 200-level Geography course.

Credits: 4

GEOG-311 Seminar

These seminars present selected topics in geography that reflect contemporary problems, current geographical ideas, philosophical and methodological trends in geography, and/or the history and development of geographical thought.

GEOG-312 Seminars

These seminars present selected topics in geography that reflect contemporary problems, current geographical ideas, philosophical and methodological trends in geography, and/or the history and development of geographical thought.

GEOG-313 Third World Development

Fall
Offers an interdisciplinary perspective on social, economic, and political features of contemporary development in Africa, Asia, and Latin America, regions referred to as the Third World or the South, and provides an introduction to theoretical origins and definitions of economic growth, development, and underdevelopment. It then addresses more specific aspects of development such as trends in population growth, migration, and urbanization; agrarian change; livelihood strategies and aspects of social welfare such as health, education, and shelter; poverty and the environment; and external economic relationships. The latter part of the course draws extensively on selected case studies. 

Applies to requirement(s): Social Sciences; Multicultural Perspectives

G. Kebbede

Restrictions: This course is open to Juniors and Seniors.

Prereq: 4 credits in department and 4 credits in related social sciences at 200 level.

Credits: 4

GEOG-319 Africa: Problems and Prospects

Spring
This course intends to offer an interdisciplinary perspective on selected contemporary development problems in Africa south of the Sahara. Central to the course will be an examination of the social, economic, and political consequences of colonialism, the physical resource base and ecological crisis, agrarian systems and rural development, gender relations and development,
urbanization and industrialization, and the problems and prospects of regional cooperation and integration.

Applies to requirement(s): Social Sciences; Multicultural Perspectives
G. Kebbede

Restrictions: This course is open to Juniors and Seniors.
Prereq: 4 credits in department and 4 credits at the 200 level in geography or related social science.
Credits: 4

GEOG-320  Research with Geospatial Technologies
Spring
Geographic Information Systems (GIS) and remote sensing are essential tools for geographic analysis in both the biophysical and social sciences. This course uses a semester-long project that includes field and laboratory instruction to allow students to develop hands-on skills with spatial data and analysis software. Students will be able to present potential employers with a portfolio containing examples of their ability to develop and execute a GIS/remote sensing application project.

Applies to requirement(s): Math & Sciences
T. Millette
Prereq: Geography 205.
Credits: 4

GEOG-395  Independent Study
Fall and Spring
The department
Instructor permission required.
Credits: 1-8
Course can be repeated for credit.

GEOG-399  Getting Ahead in Geology and Geography
Fall
This course provides support and mentoring for geology and geography majors as they pursue internships, summer jobs, independent research, and careers. Experiences will include: resume and communication workshops; self-reflection and sharing opportunities for students returning from internships, work experiences, and semesters abroad; guidance on preparing for, selecting, and applying to graduate school; information about careers in education and teacher licensure; and discussion of new research in geology and geography.

Crosslisted as: Geology 399
Applies to requirement(s): Meets No Distribution Requirement
M. Markley
Restrictions: This course is limited to Geography and Geology majors and minors
Notes: Course meets on Fridays after Earth Adventures
Credits: 1
Grading: CR/NC Grading only (no letter grading).