Appendix E. List of GEOG courses with catalog course descriptions, including all courses in proposed new BS in Geography and Geospatial Science.

Courses in red font are new.

Courses in blue font are former GEO courses with a new GEOG number and change of title and in some cases change of description and/or credits.

Courses in green font have a new GEOG number.

Courses in black font have the new GEOG designator but retain the GEO number.

New Course No.	New course title	Old course no.
GEOG 102	Intro to Physical Geography GEOG 102. INTRODUCTION TO PHYSICAL GEOGRAPHY. (4). Processes that shape the earth's surface. Weathering, mass movement, landforms, river systems, groundwater, biogeography, human effects on the landscape. Use of maps and imagery. Lec/lab. This class is a Baccalaureate Core Course in the Perspectives Category (Physical science with lab).	GEO 102
GEOG 103	Intro to Human Geography INTRODUCTION TO HUMAN GEOGRAPHY (3). Introduction to how human activity affects or is influenced by the earth's surface, including languages, religions, migration, development, and resources. This class is a Baccalaureate Core Course in the Perspectives Category (Social Processes and Institutions subcategories)	none
GEOG 105	Geography of the non-western world GEOGRAPHY OF THE NON-WESTERN WORLD (3). An introduction to the rich variety of environments, population and settlement dynamics, cultures, geopolitical changes, and economies in Africa, the Middle East, and Asia. (Bacc Core Course)	GEO 105
GEOG 106	Geography of the western world GEOGRAPHY OF THE WESTERN WORLD (3). An introduction to the rich variety of environments, population and settlement dynamics, cultures, geopolitical changes, and economics in Europe and Russia, Australia and Oceania, and the Americas. (Bacc Core Course)	GEO 106
GEOG 201	Intro to geospatial technologies and spatial reasoning INTRODUCTION TO GEOSPATIAL TECHNOLOGIES AND SPATIAL REASONING (4). Introduction to geospatial technologies such as GPS, smartphones, mobile devices, and online mapping and navigation tools used in GIS, remote sensing, and geovisualization. Concepts and applications in government, business, and the environment. This class is a Baccalaureate Core Course in the Perspectives Category (Physical Science with lab).	GEO 301
GEOG 204	Intro to human-environment geography INTRODUCTION TO HUMAN-ENVIRONMENT GEOGRAPHY (3). Introduction to how human societies manage resources, physical limits to sustainability, role of science in the use and management of resources, and how societal resource use adversely affects other societies, in human history and across spatial scales. This class is a Baccalaureate Core Course in the Difference, Power, and Discrimination Category.	none
GEOG 300	Sustainability for the common good SUSTAINABILITY FOR THE COMMON GOOD. (3). Geography of human relationships to earth's systems with an emphasis on individual impacts and collective efforts to achieve environmental sustainability. Lec/rec. (Bacc Core Course) PREREQS: Upper-division standing.	GEO 300

GEOG 300H	Sustainability for the common good	GEO 300H
GEOG 511	History and philosophy of geography HISTORY AND PHILOSOPHY OF GEOGRAPHY (3). The historical development of research traditions in the discipline of geography. This includes an examination of changes in conceptual structures and current trends. **PREREQS:** Graduate standing in geography (or related field).	GEO 515
GEOG 512	Social-ecological systems SOCIAL-ECOLOGICAL SYSTEMS (3). Exploration of critical debates surrounding theories associated with social-ecological systems, resilience, vulnerability, adaptation, social learning, transformation, adaptive governance. PREREQS: 9 credits of graduate study. Note: This course builds on material covered in GEO 420/GE 520, Resilience-Based Natural Resource Management.	GEO 554
GEOG 311	Geography of Africa GEOGRAPHY OF AFRICA (3). An introduction to the physical, historical, cultural, political, and development geography of Africa south of the Sahara. Offered alternate years. (NC) (Bacc Core Course)	GEO 325
GEOG 312	Geography of Europe GEOGRAPHY OF EUROPE (3).A regional overview precedes a topical examination of Europe's diverse physical and cultural landscapes and lifestyles. (Bacc Core Course)	GEO 326
GEOG 313	Geography of Asia GEOGRAPHY OF ASIA (3). Geographic analysis of Asia's lands and peoples. Emphasis on regional physical environments, resources and development potentials, population trends, and international importance to the United States. May not be offered each year. (NC) (Bacc Core Course)	GEO 327
GEOG 314	Geography of Latin America GEOGRAPHY OF LATIN AMERICA (3). Focuses on the diverse landscapes, peoples and cultural traditions of Latin America, a vast region extending from the United States-Mexican border to the southern tip of South America. (NC) (Bacc Core Course	GEO 328
GEOG 315	Geography of the US and Canada GEOGRAPHY OF THE US AND CANADA (3). Cultural, economic, political, and settlement geography. Emphasis on regional patterns and problems. Analysis of recent and projected changes. (Bacc Core Course)	GEO 329
GEOG 323	Climatology CLIMATOLOGY. (4). Systematic analysis of global and regional climates. Physical principles of climate, climate classifications, and distribution and characteristics of climate regimes. Lec/lab. (Writing Intensive Course) PREREQS: GEOG 102 [D-] or GEO 202 [D-]	GEO 323
GEOG 324	Geography of Life GEOGRAPHY OF LIFE: SPECIES DISTRIBUTIONS AND CONSERVATION (4). Plant, animal, and biotic community distribution and dynamics. Effect of climate, tectonics, disturbance on extinction, speciation, and succession. Field trip(s) required; transportation fee charged. Lec/lab.	GEO 324
GEOG 423	Snow hydrology SNOW HYDROLOGY (4). Fundamentals of snow hydrology. Physical principles of snow formation, snowpack accumulation, energy balance, snowcover-climate interactions, snow metamorphism, snowpack ablation, snowpack/snowmelt chemistry, remote sensing of snow, avalanches, field methods, snowmelt/runoff modeling techniques, and	GEO 483

	watershed processes. PREREQS: GEO 202 and MTH 111	
GEOG 523	Snow hydrology SNOW HYDROLOGY (4). Fundamentals of snow hydrology. Physical principles of snow formation, snowpack accumulation, energy balance, snowcover-climate interactions, snow metamorphism, snowpack ablation, snowpack/snowmelt chemistry, remote sensing of snow, avalanches, field methods, snowmelt/runoff modeling techniques, and watershed processes. PREREQS: GEO 202 and MTH 111	GEO 583
GEOG 330	Geography of international development and globalization GEOGRAPHY OF INTERNATIONAL DEVELOPMENT AND GLOBALIZATION (3). Introduction to the geography of global wealth and inequality with a focus on contemporary development, underdevelopment, and globalization problems in Asian, African, Caribbean, Latin American, and Pacific Island countries. (Bacc Core Course) (Writing Intensive Course) PREREQS: GEO 105 or GEO 106 or instructor approval.	GEO 330
GEOG 331	Population, Consumption and Environment POPULATION, CONSUMPTION, AND ENVIRONMENT (3). Patterns of spatial distribution of human populations, data sources, data display, population structure and dynamics, relationship between population, resources, and quality of life. Problems of growth and alternative futures. Offered alternate years. (SS) (Bacc Core Course) PREREQS: Upper-division standing.	GEO 350
GEOG 430	Resilience-based natural resource management RESILIENCE-BASED NATURAL RESOURCE MANAGEMENT (3). Relationships between people and the environment and social causes and consequences of environmental change throughout the world. Interdependence of social and ecological systems and implications for environmental decision making and natural resource management.	GEO 420
GEOG 431	Global resources and development GLOBAL RESOURCES AND DEVELOPMENT (3). Examines resource development issues and strategies in the Global South. Issues and strategies from agriculture, forestry, fisheries, energy, wildlife management, mineral development, land use, and health are examined. Offered every other odd year in spring.	GEO 426
GEOG 432	Geography of food and agriculture GEOGRAPHY OF FOOD AND AGRICULTURE (3). Overview of food and agriculture in relation to production and consumption regions as a basis for distinguishing different types of food and agricultural systems. Local and global examination of the geographic aspects of breeding, location in agricultural systems, and adaptation in agro-ecosystems using field study, exploration of literature, and lecture. Lec/lab. (Bacc Core Course)	GEO 449
GEOG 530	Resilience-based natural resource management RESILIENCE-BASED NATURAL RESOURCE MANAGEMENT (3). Relationships between people and the environment and social causes and consequences of environmental change throughout the world. Interdependence of social and ecological systems and implications for environmental decision making and natural resource management.	GEO 520
GEOG 531	Global resources and development GLOBAL RESOURCES AND DEVELOPMENT (3). Examines resource development issues and strategies in the Global South. Issues and strategies from agriculture, forestry, fisheries, energy, wildlife management, mineral development, land use, and health are examined. Offered every other odd year in spring.	GEO 526

GEOG 532	Geography of food and agriculture GEOGRAPHY OF FOOD AND AGRICULTURE (3). Overview of food and agriculture in relation to production and consumption regions as a basis for distinguishing different types of food and agricultural systems. Local and global examination of the geographic aspects of breeding, location in agricultural systems, and adaptation in agro-ecosystems using field study, exploration of literature, and lecture. Lec/lab. (Bacc Core Course)	GEO 549
GEOG 240	Climate change, water, and society CLIMATE CHANGE, WATER, AND SOCIETY (3). Introduction to social, ecological and economic impacts of climate change induced water problems in various geographic regions and cultures. Approaches to climate change mitigation and adaptation in various parts of the world. (Bacc Core Course)	GEO 204
GEOG 340	Intro to water science and policy INTRODUCTION TO WATER SCIENCE AND POLICY (3). Policy and science of the hydrologic cycle. Emphasis on interaction between water's natural time-space fluctuations and human uses. (Bacc Core Course) CROSSLISTED as SOIL 340.	GEO 335, SOIL 335
GEOG 340H	Intro to water science and policy INTRODUCTION TO WATER SCIENCE AND POLICY (3). Policy and science of the hydrologic cycle. Emphasis on interaction between water's natural time-space fluctuations and human uses. (Bacc Core Course) PREREQS: Honors College approval required.	GEO 335H
GEOG 440	Water resources management in the US WATER RESOURCES MANAGEMENT IN THE US (3). An investigation of the various approaches to water resources geography within the U.S. Explores the disciplines that address water resources management, their tools, and their limitations. Topics include engineering, law, economics, risk assessment, game theory, conflict resolution, and the fine arts. Offered separately as GEO 440 and GEO 540. PREREQS: 9 credits of upper-division geography and any course dealing with the hydrologic cycle.	GEO 425
GEOG 441	International water resources management INTERNATIONAL WATER RESOURCES MANAGEMENT (3). An investigation of the various approaches to water resources geography at the international level. Explores the interaction between water science and policy through issues of current "hydropolitics" and water resources development. Topics include water quality, dams and development, conflict and cooperation, climate change, and water institutions. Offered separately as GEO 424 and GEO 524. **PREREQS:** 9 credits of upper-division geography and any course dealing with the hydrologic cycle.	GEO 424
GEOG 540	Water resources management in the US WATER RESOURCES MANAGEMENT IN THE US (3). An investigation of the various approaches to water resources geography within the U.S. Explores the disciplines that address water resources management, their tools, and their limitations. Topics include engineering, law, economics, risk assessment, game theory, conflict resolution, and the fine arts. Offered separately as GEO 440 and GEO 540. PREREQS: 9 credits of upper-division geography and any course dealing with the hydrologic cycle.	GEO 525
GEOG 541	International water resources management INTERNATIONAL WATER RESOURCES MANAGEMENT (3). An investigation of the various approaches to water resources geography at	GEO 524

	the international level. Explores the interaction between water science and policy through issues of current "hydropolitics" and water resources development. Topics include water quality, dams and development, conflict and cooperation, climate change, and water institutions. Offered separately as GEO 424 and GEO 524. **PREREQS:** 9 credits of upper-division geography and any course dealing with the hydrologic cycle.	
GEOG 546	Advanced landscape and seascape ecology ADVANCED LANDSCAPE AND SEASCAPE ECOLOGY (4). Pattern-process interactions in large scale ecological and physical systems, including terrestrial, aquatic, and marine/ocean ecosystems. Principles of pattern-process interactions from genetic to community levels of ecological organization applied to design of conservation reserves. Hypothesis testing, field techniques, spatial models/statistics, GIS/remote sensing. Lec/lab.	GEO 546
GEOG 250	Geography of land use planning GEOGRAPHY OF LAND USE PLANNING (3). Introduction to the history and current practices of land use and community planning. Learn to use basic geospatial tools to assess land use patterns and planning processes.	none
GEOG 251	Geography of disaster management GEOGRAPHY OF DISASTER MANAGEMENT (3). Introduction to the geographic concepts and processes for effective disaster management, including response, recovery, mitigation and preparedness. Risk assessment and evidence-based best practices to prepare and respond to emergencies in a variety of geographic contexts. (Bacc Core Course)	GEO 205
GEOG 350	Geography of natural hazards GEOGRAPHY OF NATURAL HAZARDS: RISK, VULNERABILITY, AND RESILIENCE (3). Introduction to the geography of risk, natural hazards, and disasters, focusing on concepts of vulnerability, adaptation and resilience of human society in the Pacific Northwest and globally. (Bacc Core Course)	GEO 304
GEOG 450	Land use in the American West LAND USE IN THE AMERICAN WEST (3). Development of a conceptual framework for land use study; analysis of land as a resource, land use trends, land use principles, and management issues as related to planning, focusing on the American West, the fastest growing region in the nation	GEO 423
GEOG 451	Planning principles and practices for resilient communities PLANNING PRINCIPLES AND PRACTICES FOR RESILIENT COMMUNITIES (4). Applies GIS skills and techniques to determine and analyze future land uses. Planning process using GIS tools, including identifying community goals, land use constraints, and potential land use conflicts and learning how to manage these conflicts using regulatory and market-based tools.	GEO 452
GEOG 452	Sustainable Site Planning SUSTAINABLE SITE PLANNING (3). Use of geographic concepts and techniques in site planning to create sustainable management reports for local sites. Inventory of environmental characteristics and human uses, conceptual design for future uses of the site, principles of green infrastructure and sustainable building practices. Local field trip required.	GEO 451
GEOG 453	Land use planning LAND USE PLANNING - IMPLEMENTATION AND EVALUATION (3). Methods of resource analysis for land use planning; resource rating	GEO 453

	systems; environmental impact assessment: laws, procedures, and methods. Field trip(s) may be required; transportation fee charged. Offered alternate years. PREREQS**:** GEOG 452	
GEOG 550	Land use in the American West LAND USE IN THE AMERICAN WEST (3). Development of a conceptual framework for land use study; analysis of land as a resource, land use trends, land use principles, and management issues as related to planning, focusing on the American West, the fastest growing region in the nation.	GEO 523
GEOG 551	Planning principles and practices for resilient communities PLANNING PRINCIPLES AND PRACTICES FOR RESILIENT COMMUNITIES (4). Applies GIS skills and techniques to determine and analyze future land uses. Planning process using GIS tools, including identifying community goals, land use constraints, and potential land use conflicts and learning how to manage these conflicts using regulatory and market-based tools.	GEO 552
GEOG 552	Sustainable Site Planning SUSTAINABLE SITE PLANNING (3). Use of geographic concepts and techniques in site planning to create sustainable management reports for local sites. Inventory of environmental characteristics and human uses, conceptual design for future uses of the site, principles of green infrastructure and sustainable building practices. Local field trip required.	GEO 551
GEOG 553	Land use planning LAND USE PLANNING - IMPLEMENTATION AND EVALUATION (3). Methods of resource analysis for land use planning; resource rating systems; environmental impact assessment: laws, procedures, and methods. Field trip(s) may be required; transportation fee charged. Offered alternate years. PREREQS**:** GEOG 452	GEO 553
CANCEL	CANCEL	GEO 465
GEOG 360	GIScience I: Intro to Geographic Information Systems GISCIENCE I: INTRODUCTION TO GEOGRAPHIC INFORMATION SYSTEMS (4). Introduction to the principles of geographic information systems (GIS) and experience using a widely popular geographic information system for spatial data input, analysis, and display. PREREQS: GEOG 201.	GEO 365
GEOG 361	GIScience II: Analysis and applications in GIScience GISCIENCE II: ANALYSIS AND APPLICATIONS IN GISCIENCE. (4) Applications-based course. Development and conduct of geospatial analyses using various spatial data structures, techniques and models. Students acquire, clean, integrate, manipulate, visualize and analyze geospatial data through laboratory work. PREREQS: GEOG 360.	GEO 480
GEOG 462	GIScience III: Programming for Geospatial Analysis GISCIENCE III: PROGRAMMING FOR GEOSPATIAL ANALYSIS. (4) Introduction to the extension of geographic information systems (GIS) through programming. This course teaches students to design and write programs to automate geospatial analysis. No prior programming experience is expected. PREREQS: GEOG 362 (undergraduates) or 562 (graduates).	
GEOG 463	GIScience IV: Spatial modeling GISCIENCE IV: SPATIAL MODELING (4). Introduction to spatial simulation models representing attraction, segregation, individual entities, and processes of spread, applied to contemporary problems in human and physical geography. PREREQS: GEOG 361 (undergraduates) or 561 (graduates).	

GEOG 464	Geospatial Intelligence: Security, Surveillance and Ethics GEOSPATIAL INTELLIGENCE: SECURITY, SURVEILLANCE, AND ETHICS (3). Use of GIScience, remote sensing, and spatial analysis in geospatial intelligence and their environmental, social, and political implications. Concepts and practices of ethics in geospatial science, including data access, data management, and decision-making. PREREQS: 9 credits of upper-division geography.	
GEOG 560	GIScience I: Intro to Geographic Information Systems INTRODUCTION TO GEOGRAPHIC INFORMATION SCIENCE (4). Introduction to modern spatial data processing, development, and functions of geographic information systems (GIS); theory, concepts and applications of geographic information science (GIScience). Lec/lab.	GEO 565
GEOG 561	GIScience II: Analysis and applications in GIScience GISCIENCE II: ANALYSIS AND APPLICATIONS IN GISCIENCE. (4) Applications-based course. Development and conduct of geospatial analyses using various spatial data structures, techniques and models. Students acquire, clean, integrate, manipulate, visualize and analyze geospatial data through laboratory work. PREREQS: GEOG 360.	GEO 580
GEOG 562	GIScience III: Programming for Geospatial Analysis GISCIENCE III: PROGRAMMING FOR GEOSPATIAL ANALYSIS. (4) Introduction to the extension of geographic information systems (GIS) through programming. This course teaches students to design and write programs to automate geospatial analysis. No prior programming experience is expected. PREREQS: GEOG 362 (undergraduates) or 562 (graduates).	GEO 578
GEOG 563	GIScience IV: Spatial modeling GISCIENCE IV: SPATIAL MODELING (4). Introduction to spatial simulation models representing attraction, segregation, individual entities, and processes of spread, applied to contemporary problems in human and physical geography. PREREQS: GEOG 361 (undergraduates) or 561 (graduates).	
GEOG 564	Geospatial Intelligence: Security, Surveillance and Ethics GEOSPATIAL INTELLIGENCE: SECURITY, SURVEILLANCE, AND ETHICS (3). Use of GIScience, remote sensing, and spatial analysis in geospatial intelligence and their environmental, social, and political implications. Concepts and practices of ethics in geospatial science, including data access, data management, and decision-making. PREREQS: 9 credits of upper-division geography.	GEO 567
GEOG 565	Spatio-temporal variation in ecology and earth science SPATIOTEMPORAL VARIATION IN ECOLOGY AN EARTH SCIENCE (4). Objectives and techniques of spatial and temporal analysis. Point patterns, geostatistics, spectral analysis, wavelet analysis, interpolation, and mapping. Lec/lab. PREREQS: ST 411 or ST 511	GEO 541
GEOG 566	Advanced spatial statistics and GIScience ADVANCED SPATIAL STATISTICS AND GISCIENCE (4). Provides advanced graduate students from a variety of disciplines in earth science and ecology the opportunity to structure and conduct spatio-temporal analyses using available software tools and their own datasets for their graduate research. Lec/lab.	GEO 584
GEOG 370	Geovisualization I: Cartography GEOVISUALIZATION I: CARTOGRAPHY. (4) Basic cartographic principles. Design, compilation, and construction of maps. Lec/lab. PREREQS: GEOG 201.	GEO 360
GEOG 371	Geovisualization II: Web mapping GEOVISUALIZATION II: WEB MAPPING. (4) Overview of methods	

	and applications in interactive, dynamic cartographic visualization. Design and construction of customized user interfaces to geographic information. Lec/lab. PREREQS: GEOG 201.	
GEOG 472	Geovisualization III: Geovisual analytics GEOVISUALIZATION III: GEOVISUAL ANALYTICS (3). Concepts and techniques underlying the production of maps by computer. Practical experience with a variety of computer mapping packages. . Lec/lab. PREREQS: GEO 360 and MTH 112.	GEO 445
GEOG 571	Geovisualization II: Web mapping GEOVISUALIZATION II: WEB MAPPING. (4) Overview of methods and applications in interactive, dynamic cartographic visualization. Design and construction of customized user interfaces to geographic information. Lec/lab. PREREQS: GEOG 370.	GEO 568
GEOG 572	Geovisualization III: Geovisual analytics GEOVISUALIZATION III: GEOVISUAL ANALYTICS (3). Concepts and techniques underlying the production of maps by computer. Practical experience with a variety of computer mapping packages. . Lec/lab. PREREQS: GEO 360 and MTH 112.	GEO 545
GEOG 573	Geovisualization IV: Algorithms for Geographic Information Science GEOVISUALIZATION III: ALGORITHMS FOR GEOGRAPHIC INFORMATION SCIENCE (4). Introduction to algorithms and data models for the manipulation and visualization of geospatial data. Students are introduced to object-oriented programming using the Java programming language. **PREREQS:** GEO 545 [D-] and GEO 565 [D-] and GEO 578 [D-] and /or equivalent courses and programming experience.	GEO 577
GEOG 480	Remote sensing I: Principles and Applications REMOTE SENSING I: PRINCIPLES AND APPLICATIONS. (4). Fundamentals of satellite remote sensing and image analysis. Topics include physical principles of remote sensing from the ultraviolet to the microwave, sensors and sensor technology, and environmental applications of remote sensing through image analysis. Lec/lab. PREREQS: GEOG 201.	GEO 444
GEOG 481	Remote sensing II: Digital Image Processing DIGITAL IMAGE PROCESSING (4). Digital analysis of remote sensor data. Image display enhancement, classification, and rectification principles. Practical experience with an image processing system. Lec/lab. PREREQS: GEO 444 [D-]	GEO 466
GEOG 580	Remote sensing I: Principles and Applications REMOTE SENSING I: PRINCIPLES AND APPLICATIONS. (4). Fundamentals of satellite remote sensing and image analysis. Topics include physical principles of remote sensing from the ultraviolet to the microwave, sensors and sensor technology, and environmental applications of remote sensing through image analysis. Lec/lab. PREREQS: GEOG 201.	GEO 544
GEOG 581	Remote sensing II: Digital Image Processing DIGITAL IMAGE PROCESSING (4). Digital analysis of remote sensor data. Image display enhancement, classification, and rectification principles. Practical experience with an image processing system. Lec/lab. PREREQS: GEO 444 [D-]	GEO 566
GEOG 295	Introduction to geographic field research INTRODUCTION TO GEOGRAPHIC FIELD RESEARCH (3). Two-week course taught in the fall program in various locations throughout the west. Collect and analyze data associated with both human and physical geography. Lec/lab. **PREREQS:** GEOG 201 and GEOG 202.	GEO 296

GEOG 495	Field geography of Oregon I FIELD GEOGRAPHY OF OREGON (3). Designed as a capstone experience for Earth Science and Geography majors. It will challenge students to apply assessment techniques to determine the orgins of the physical features of a landscape, then what impacts those features have on the area's human geography, and vice versa. Three weekend field trips required. **PREREQS:** GEO 296 or other field course strongly recommended; junior or senior standing. Restricted to Earth Science and Geography majors.	GEO 435
GEOG 595	Field geography of Oregon II FIELD GEOGRAPHY OF OREGON (3). Designed to introduce students to the widest possible range of topics on all aspects of Oregon geography within a limited time, then turn that experience into a viable research proposal. While physical processes are the primary topic, resource and environmental effects are stressed.	GEO 534
GEOG 596	Field research in geomorphology and landscape ecology Catalog course description. FIELD RESEARCH IN GEOMORPHOLOGY AND LANDSCAPE ECOLOGY (3). Natural history interpretation of disturbance and recovery processes and management implications in forest-stream landscapes of western Oregon. Course consists of field experience and several seminars. Transportation and lodging fee charged. **PREREQS:** 9 graduate credits of sciences or engineering.	GEO 548
GEOG 199	Special studies	
GEOG 299	Special studies	
GEOG 399	Special topics	
GEOG 399H	Special topics	
GEOG 499	Special topics	
GEOG 599	Special topics	
GEOG 699	Special topics	
GEOG 400	Field trips FIELD TRIPS (1-16). Participation in group field trips that are not a part of any other course. Transportation fee is charged. Students may prepare guides for trips. Faculty sponsor must be prearranged. Graded P/N. This course is repeatable for a maximum of 48 credits. **PREREQS:** Departmental approval required.	
GEOG 500	Field trips FIELD TRIPS (1-16). Participation in group field trips that are not a part of any other course. Transportation fee is charged. Students may prepare guides for trips. Faculty sponsor must be prearranged. Graded P/N. This course is repeatable for a maximum of 48 credits. **PREREQS:** Departmental approval required.	
GEOG 600	Field trips FIELD TRIPS (1-16). Participation in group field trips that are not a part of any other course. Transportation fee is charged. Students may prepare guides for trips. Faculty sponsor must be prearranged. Graded P/N. This course is repeatable for a maximum of 48 credits. **PREREQS:** Departmental approval required.	
GEOG 401	Research RESEARCH (1-16). Independent, original research subjects guided by faculty conferences and resulting in a brief written report. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 24 credits. PREREQS: Departmental approval required.	

GEOG 501 Research
RESEARCH (1-16). Independent, original research subjects guided by faculty conferences and resulting in a brief written report. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 24 credits. PREREQS: Departmental approval required.

GEOG 601 Research
RESEARCH (1-16). This course is repeatable for a maximum of 36 credits. PREREQS: Departmental approval required.

GEOG 403 Thesis
THESIS (1-16). Independent, original study that culminates in a senior thesis. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 24 credits. PREREQS: Departmental approval required.

GEOG 503 Thesis
THESIS (1-16). Independent, original study that culminates in a thesis. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 999 credits. PREREQS: Departmental approval required.

GEOG 603 Thesis
THESIS (1-16). This course is repeatable for a maximum of 999 credits.

GEOG 405 Reading and conference
READING AND CONFERENCE (1-16). Independent reading in specialized topics guided by and discussed in faculty conferences. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 16 credits. PREREQS: Departmental approval required.

GEOG 505 Reading and conference
READING AND CONFERENCE (1-16). Independent reading in specialized topics guided by and discussed in faculty conferences. Faculty sponsor must be prearranged. This course is repeatable for a maximum of 16 credits. PREREQS: Departmental approval required.

GEOG 605 Reading and conference
READING AND CONFERENCE (1-16). This course is repeatable for a maximum of 16 credits.

GEOG 407 Seminar
SEMINAR (1-16). Graded P/N. This course is repeatable for a maximum of 12 credits. PREREQS: Departmental approval required.

GEOG 507 Seminar
SEMINAR (1-16). Graded P/N. This course is repeatable for a maximum of 12 credits. PREREQS: Departmental approval required.

GEOG 607 Seminar
SEMINAR (1-16). Graded P/N. This course is repeatable for a maximum of 12 credits. PREREQS: Departmental approval required.

GEOG 408 Workshop
WORKSHOP (1-16). This course is repeatable for a maximum of 12 credits. PREREQS: Departmental approval required.

GEOG 508 Workshop
WORKSHOP (1-16). This course is repeatable for a maximum of 12 credits. PREREQS: Departmental approval required.

GEOG 608 Workshop
WORKSHOP (1-16). This course is repeatable for a maximum of 24 credits. PREREQS: Departmental approval required.

GEOG 410 Internship
INTERNSHIP (1-15). Pre-career professional experience under joint faculty and employer supervision. Graded P/N. This course is repeatable for a maximum of 48 credits. PREREQS: 12 credits of upper-division geography and departmental approval required.

GEOG 510 Internship

INTERNSHIP (1-15). Pre-career professional experience under joint faculty and employer supervision. May not be used to meet minimum credit hour requirements for graduate degrees in geography. Graded P/N. This course is repeatable for a maximum of 16 credits. PREREQS: 12 credits of upper-division geography.