

**806. Topics in French Linguistics**  
Spring of even-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Key issues in theoretical and applied French linguistics. Syntax, morphology, phonology, and semantics. Foreign language acquisition.

**807. Topics in the Development of French Culture**  
Spring of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
French culture through the history of ideas, through the evolution of institutions, or through literature and the related arts.

**810. Studies in Medieval French Literature.**  
Spring of even-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Works of major writers of the French Middle Ages.

**815. Studies in 16th-Century French Literature**  
Fall of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Works of major prose writers and poets of the Renaissance and Reformation.

**820. French Literature of the 17th Century**  
Spring of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Works of major writers of the seventeenth century.

**825. Studies in 18th-Century French Literature**  
Fall of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Works of major writers of the French Enlightenment.

**830. Studies in 19th Century Literature**  
Spring of even-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Major authors and selected topics in poetry, prose, and drama of the nineteenth century.

**835. Studies in 20th Century Literature**  
Fall of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Spiritual, intellectual, psychological, and aesthetic conflicts in texts with world-wide impact.

**840. French Quebecois Literature**  
Spring of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
R: Approval of department.  
Major authors and selected topics in the poetry, prose, and drama of Quebec.

**845. Francophone Third World Literature**  
Fall of odd-numbered years. 3(3-0) A student may earn a maximum of 9 credits in all enrollments for this course.  
Leading figures, themes, and movements of Francophone literatures outside France. The colonial period, Negritude, satire, commitment and revolution, and problems of independence.

**890. Independent Study**  
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 9 credits in all enrollments for this course.  
R: Approval of department.  
Special projects, directed reading, and research arranged by an individual graduate student and a faculty member in areas supplementing regular course offerings.

**891. Special Topics in French**  
Fall, Spring, Summer. 3(3-0) A student may earn a maximum of 6 credits in all enrollments for this course.  
R: Approval of department.  
Special topics supplementing regular course offerings proposed by faculty for graduate students on a group study basis.

**999. Doctoral Dissertation Research**  
Fall, Spring, Summer. 1 to 24 credits. A student may earn a maximum of 24 credits in all enrollments for this course.  
R: Approval of department.

## GENERAL BUSINESS AND BUSINESS LAW GBL

Department of Finance  
The Eli Broad College of Business  
and The Eli Broad Graduate  
School of Management

**395. Law, Public Policy, and Business**  
Fall, Spring, Summer. 3(3-0)  
R: Open only to juniors and seniors. Not open to students with credit in GBL 395H.  
Structure of the legal system. Basic concepts of constitutional law, torts, contracts, and product liability. Administrative law and government regulation of business.

**395H. Law, Public Policy, and Business -- Honors (W)**  
Fall. 3(3-0)  
R: Open only to Honors College juniors and seniors. Completion of Tier I writing requirement. Not open to students with credit in GBL 395.  
Structure of the legal system and basic concepts of constitutional law, torts, contracts, and product liability. Administrative law and government regulation of business.

**420. Role of Law and Lawyers in Society (W)**  
Fall, Spring. 3(3-0)  
P: GBL 395. R: Open only to seniors and graduate students. Completion of Tier I writing requirement.  
Law and its relationship to economics, business, and social justice. Comparative law. Legislative and judicial processes. The role of lawyers. Overview of legal education.

**447. Hospitality Law**  
Fall, Spring. 3(3-0)  
P: GBL 395. R: Open only to seniors and graduate students.  
Legal aspects of hospitality industry, including contracts and sales, torts, commercial paper, and organization. Dynamics of the changing work force and employment discrimination. Franchising.

**451. Law of Commercial Transactions**  
Spring. 3(3-0)  
P: GBL 395. R: Open only to seniors and graduate students.  
Law of contracts and sales, commercial paper, secured transactions, consumer credit, and debtor-creditor relationships.

**460. International Law and Business**  
Spring. 3(3-0)  
P: GBL 395. R: Open only to seniors and graduate students.  
The impact of international law on business practices. Government regulation of international business.

**480. Corporate and Professional Social Responsibility**  
Spring. 3(3-0)  
P: GBL 395. R: Open only to seniors and graduate students.  
Institutionalization of American working life, large business institutions, and the law. Control of large business institutions. Social obligations of corporations and professions. Impact of institutional values on individual values.

**490. Independent Study**  
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course.  
P: GBL 395. R: Open only to seniors.  
Program of observation and work in selected business firms and government. Supervised independent research on selected legal topics.

**848. Legal Environment of Business**  
Fall, Spring. 3(3-0)  
R: Open only to students in the Professional Accounting, Master of Business Administration programs, and to students in programs for which GBL 848 is a catalog-listed requirement.  
The legal, political, and social environment of business and the structural framework in which law functions.

**859. Business Legal Environment**  
Spring. 2(2-0)  
R: Open only to Master's students in the Advanced Management Program.  
Critical analysis of government regulation of business from legal, political, and social perspectives. An examination of moral concepts and social policy underlying government regulation.

**880. Corporate and Professional Social Responsibility**  
Fall. 3(3-0)  
R: Open only to graduate students in Business and students in programs for which GBL 880 is a catalog-listed requirement.  
Impact of corporations and professions in societies and across societies. Control of business organizations. Social and moral responsibilities of organizations. The individual's role in a business organization.

**890. Independent Study**  
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course.  
P: GBL 848. R: Open only to graduate students in Business. Approval of department.  
Faculty-supervised independent study.

## GENETICS GEN

College of Natural Science

**800. Genetics Seminar**  
Fall, Spring, Summer. 1(1-0) A student may earn a maximum of 12 credits in all enrollments for this course.  
Critical analysis of current literature. Student presentations.

**Descriptions —Genetics  
of  
Courses**

**835. Eukaryotic Molecular Genetics**  
Spring, 3(3-0) Interdepartmental with Microbiology. Administered by Microbiology.  
P: BCH 462, ZOL 341. R: Open only to graduate students in the colleges of Agriculture and Natural Resources, Engineering, Human Medicine, Natural Science, Osteopathic Medicine, and Veterinary Medicine.  
Gene structure and function in animals, plants, and fungi. Basic aspects of modern human genetics and the genetic basis for disease. Molecular genetic analyses. Eukaryotic modeling systems.

**841. Chromosome Structure and Genetics**  
Spring of even-numbered years. 3(3-0) Interdepartmental with Zoology. Administered by Zoology.  
R: Approval of department.  
Classical and molecular genetics of chromosome structure and behavior in mitosis and meiosis. Synapsis and disjunction, exchange, centromeres, euchromatin, heterochromatin and transposable elements.

**851. Molecular Entomology**  
Fall of odd-numbered years. 3(3-0) Interdepartmental with Entomology. Administered by Entomology.  
Analysis of molecular processes unique to insects, and their potentials for genetic engineering.

**880. Laboratory Rotation**  
Fall, Spring, Summer. 1 to 4 credits. A student may earn a maximum of 6 credits in all enrollments for this course.  
R: Open only to Ph.D. majors in Genetics.  
Participation in research with faculty members.

**890. Selected Topics in Genetics**  
Fall, Spring, Summer. 2 to 5 credits. A student may earn a maximum of 9 credits in all enrollments for this course.  
P: ZOL 341.  
Topic selected from molecular genetics, physiological genetics, population genetics, quantitative genetics, microbial genetics, somatic cell genetics, behavioral genetics, human genetics, evolution, or radiology and mutagenesis.

**999. Doctoral Dissertation Research**  
Fall, Spring, Summer. 1 to 12 credits. A student may earn a maximum of 99 credits in all enrollments for this course.  
R: Open only to Ph.D. students in Genetics.

**GEOGRAPHY** **GEO**

**Department of Geography  
College of Social Science**

**113. Introduction to Economic Geography**  
Fall, Spring. 3(3-0)  
Spatial distribution of resources, population, enterprise, trade, consumption, and production. Interaction of those distributions at local to global scales.

**151. Cultural Geography**  
Fall, Spring of even-numbered years. 3(3-0)  
Systematic approach to the spatial distribution of cultural features, processes, and relationships.

**203. Introduction to Meteorology**  
Fall. 3(3-0)  
Fundamentals of meteorology. Energy balance, adiabatic processes, horizontal motion, cyclogenesis, and severe weather.

**206. Physical Geography**  
Fall, Spring. 3(3-0)  
Geographic and functional interrelationships within the physical environment: Earth-sun relationships, weather, climate, soils, vegetation and landforms (terrain characteristics).

**206L. Physical Geography Laboratory**  
Fall, Spring. 1 credit.  
P: GEO 206 or concurrently.  
Geographic aspects of weather, climate, soil, vegetation, and terrain. Interpretation and application of maps and remotely sensed imagery.

**221. Introduction to Geographic Information**  
Fall, Spring. 3(2-2)  
Principles and methods of spatial data collection, handling, analysis, and display. Introduction to remote sensing, geographic information systems, and cartography.  
SA: GEO 225

**230. Geography of the United States and Canada**  
Fall, Spring, Summer. 3(3-0)  
Regional analysis. Evolution and status of environmental, demographic, economic, and sociocultural patterns and processes.

**233. Geography of Michigan**  
Fall of odd-numbered years. 3(3-0)  
Physical and cultural geography of Michigan.

**259. Geography of Recreation and Tourism**  
Fall of even-numbered years. 3(3-0)  
Cultural, physical, and biotic factors affecting the distribution of recreation and tourism resources and participation. U.S. and international examples and case studies.

**306. Environmental Geomorphology**  
Fall of even-numbered years, Spring. 3(3-0)  
Relationships of running water, weathering, gravity, ice, waves, wind, and biota (including humans) to terrain and soils. Evolution of landscapes. Classical and modern interpretations.

**313. Introduction to Data Analysis for Urban and Regional Planners**  
Fall. 3(2-2) Interdepartmental with Urban Planning. Administered by Urban Planning.  
P: CPS 101 or CPS 131; UP 201.  
Data gathering analysis, information presentation, and basic techniques of urban planning. Application of related computer programs and software.

**314. Methods for Investigation of Urban Systems**  
Spring. 3(2-2) Interdepartmental with Urban Planning. Administered by Urban Planning.  
P: UP 313.  
Models, approaches, and techniques for urban and regional problem analysis and plan formulation.

**324. Remote Sensing of the Environment**  
Fall, Spring. 4(2-4)  
Features and interpretation methods of remotely-sensed imagery, especially black-and-white and color infrared airphotos. Basic features of radar, thermal, and multispectral imagery. Interpretation for agriculture, archaeology, fisheries, forestry, geography, landscape architecture, planning, and wildlife management.

**326. Thematic Cartography**  
Fall. 4(2-4)  
P: GEO 221.  
Principles and techniques of map making. Decision making in designing thematic maps.

**335. Geography of Latin America**  
Fall. 3(3-0)  
R: Not open to freshmen. Completion of Tier I writing requirement.  
Physical and human geography of Latin America. Current development issues, especially people-environment interaction in urban and rural areas. Topics include migration, urbanization, and industrialization.

**336. Geography of Europe**  
Fall of odd-numbered years. 3(3-0)  
R: Not open to freshmen. Completion of Tier I writing requirement.  
Major regions and nations, including their physical resources, peoples, political structures, and economies.

**337. Geography of East Asia**  
Spring. 3(3-0)  
R: Not open to freshmen. Completion of Tier I writing requirement.  
Spatial patterns and processes of physical and human geography in China, Japan, Korea, and Taiwan. Emphasis on development problems, especially since 1950.

**338. Geography of Africa**  
Fall. 3(3-0)  
R: Not open to freshmen. Completion of Tier I writing requirement.  
Physical and human geography of Africa. Current development issues, especially people-environment interaction in urban and rural areas. Topics include drought, agricultural patterns, hunger, rural development, migration, and urbanization.

**401. Geography of Plants of North America**  
Spring of even-numbered years. 3(3-0)  
R: Not open to freshmen and sophomores.  
Geography of Plants in North America with emphasis on the East. Related ecological principles, soils, and post-cretaceous geologic history. Some field instruction.

**402. Agricultural Climatology**  
Fall of even-numbered years. 3(3-0) Interdepartmental with Biosystems Engineering.  
P: MTH 116. R: Not open to freshmen and sophomores.  
Relationships between climate and agriculture in resource assessment, water budget analysis, meteorological hazards, pests, crop-yield modeling, and impacts of global climate change.

**403. Microclimate and Its Measurement**  
Fall of odd-numbered years. 4 credits. Interdepartmental with Biosystems Engineering. Administered by Biosystems Engineering.  
P: MTH 116 R: Not open to freshmen or sophomores.  
The climate near the Earth's surface. Energy balance, thermal radiation exchange, heat fluxes, temperature sensors, wind speed and direction, humidity and evapotranspiration and their measurement.  
SA: ATM 836

**404. Synoptic Climatology**  
Fall. 4(4-0)  
P: GEO 203.  
Global climate patterns and their controls. Relationship between upper air flow and weather in the northern hemisphere westerlies.

**405. Applied Synoptic Climatology: Principles and Methods**  
Spring of odd-numbered years. 4(3-2)  
P: GEO 404 or approval of department; MTH 116.  
Dynamic and thermodynamic principles of atmospheric science applied to the development and evolution of extratropical cyclones. Laboratory sessions include analysis of current observations and satellite imagery.

**407. Regional Geomorphology of the United States**  
Fall of odd-numbered years. 3(3-0)  
P: GEO 306 or GLG 201 or GLG 412 or ISP 203.  
Geomorphic characteristics of physiographic regions of the United States.