

# ECONOMICS (ECON)

## Economics Undergraduate Courses

### **ECON 1200 SURVEY OF ECONOMICS (3 credits)**

An introduction to fundamental economic analysis, applying economic concepts to both domestic and international problems and policies.

**Prerequisite(s):** Not available to students who have completed either ECON 2200 or 2220.

**Distribution:** Social Science General Education course

### **ECON 2200 PRINCIPLES OF ECONOMICS (MICRO) (3 credits)**

An introduction to economic principles, decision making and policies affecting product and resource markets. Particular emphasis is on price, output and input decisions by individuals and firms under various market conditions. An introduction to the fundamentals of international trade.

**Prerequisite(s):** ENGL 1150 and MATH 1310 or MATH 1220 with 'C-' (1.67) or better, or permission of CBA advisor

**Distribution:** Social Science General Education course

### **ECON 2220 PRINCIPLES OF ECONOMICS (MACRO) (3 credits)**

An introduction to economic principles, decision making and policies on national income and output, employment, growth, money, the price level and the international economy.

**Prerequisite(s):** MATH 1310 or MATH 1220 and ENGL 1150 with a C-minus (1.67) or better, or permission of CBA advisor

**Distribution:** Social Science General Education course

### **ECON 2400 PRINCIPLES OF ECONOMICS FOR EDUCATORS (3 credits)**

This course teaches principles of microeconomics and macroeconomics to K-12 educators. After taking this course students will be able to use the economic way of thinking to study current economic issues. Students will be introduced to macroeconomic principles, decision-making and policies on national income and output, employment, growth, money, price level, and fundamentals of international issues. Students will study microeconomic issues including product and resource markets, and prices output and input decisions under various market conditions. Economic concepts will be aligned to K-12 state social studies standards. This course cannot be substituted for ECON 2200 and/or ECON 2220.

**Prerequisite(s):** MATH 1310 or MATH 1220, ENGL 1150, ECON 2200 or ECON 2220. Not open to non-degree graduate students.

### **ECON 2600 SURVEY OF BEHAVIORAL ECONOMICS (3 credits)**

This course examines the basic concepts behind behavioral economics and the application of behavioral economics across other fields of study. Students will be able to understand the basic variables influencing decision making, including framing and perception as well as the influence of social dynamics and psychological influences.

### **ECON 3130 ECONOMIC GEOGRAPHY (3 credits)**

An introduction to the basic concepts and approaches in contemporary economic geography, stressing the importance of the spatial perspective for an understanding of how economic processes work at global, national, regional, and local scales. (Offered Fall) (Cross-listed with GEOG 3130).

### **ECON 3200 ECONOMIC THEORY: MICRO (3 credits)**

Analysis of individual, firm and industry behavior in product and factor markets. Provides a theoretical foundation for managerial and public policy decision-making.

**Prerequisite(s):** MATH 1310 or MATH 1220 and ECON 2200, each with a "C" (2.0) or better.

### **ECON 3220 ECONOMIC THEORY: MACRO (3 credits)**

This course is designed to follow introductory economics, to examine the determination of output, employment, the price level, inflation, interest rates, and the exchange rate in the economy. Piece-by-piece, theoretical models will be constructed describing how each of these and other variables are determined in both, the long-run and in the short-run. We will analyze how changes in a particular event affect different markets in the economy, and in turn, how one market interacts with another within a general equilibrium framework. A large part of the course will be devoted to business cycle theory, macroeconomic policy issues, and open economy macroeconomics. The world economies are very much integrated, and thus, a full understanding of macroeconomics requires knowledge of international aspects of macroeconomics. The purpose of this course is to provide the student with an understanding of the connection between macroeconomic theory and related policy issues.

**Prerequisite(s):** Completion of ECON 2200 with a C or better AND ECON 2220 with a C or better

### **ECON 3290 ECONOMICS OF PUBLIC ISSUES (3 credits)**

Economics is frequently considered an abstract topic, with interesting results that are not easily applied in the real world. Through Economics of Public Issues, however, students will explore the real ways in which economics can be used to understand, explain, and answer tough questions that affect everyone. Students will explore and define capitalism and key economic institutions required for economies to develop and prosper. We will examine markets and market failures that exist today. Classes will focus on the outcomes - intended and unintended - of various policies (local, national, and global). While specific issues are going to be covered in the course the intent is that students will learn the tools and strategy of thinking like an economist to guide them through future issues that will come up in their personal, professional, and civic lives.

**Prerequisite(s):** ECON 2200 OR Instructor Approval.

### **ECON 3300 INTRODUCTION TO ECONOMETRICS (3 credits)**

An introduction to empirical research methods in economics. Subjects covered include estimations of the basic linear regression model, hypothesis testing, correlation coefficients, analysis of variance, multicollinearity, dummy variables, specification error, auto-correlation, heteroscedasticity and unconditional forecasting. Empirical illustrations are provided by reference to contemporary economic questions.

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200, ECON 2220, BSAD 2130 or BSAD 3160, each with a "C" (2.0) or better, or permission of instructor.

### **ECON 3310 SQL, DATABASES, AND DATA CLEANING FOR DATA SCIENTISTS (3 credits)**

Analytics requires data. Within an organization, this data is usually housed in databases. In this class, you will extract data from these systems using Structured Query Language (SQL), programmatically combine multiple datasets, and learn advanced programmatic data cleaning techniques, such as regular expression.

**Prerequisite(s):** ECON 2200 with a "C" or better

### **ECON 3550 PUBLIC FINANCE (3 credits)**

This course explores the objectives and rationale of government activity in a market economy, including positive and normative analysis of public expenditures and taxes. Topics include Social Security, health insurance, education, food stamps, student aid, unemployment insurance, efficiency and incidence of major revenue sources, and tax reform proposals. (Cross-listed with FNBK 3550).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better.

**ECON 3600 INTRODUCTION TO INTERNATIONAL ECONOMICS (3 credits)**

An introduction to analyses of international trade and the international monetary system. Subjects covered include the economic basis for international specialization and trade, the effect of trade on income distribution, commercial policy, economic integration, the balance of payments, adjustment mechanism, exchange rate determination, external effects of monetary and fiscal policy and foreign investment.

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better.

**ECON 4000 SPECIAL TOPICS IN ECONOMICS (3 credits)**

This course will explore a specified topic in the field of economics.

**Prerequisite(s):** Varies by offering

**ECON 4210 INDUSTRIAL ORGANIZATION (3 credits)**

In this class we will examine why firms and industries behave the way that they do. We will explore why some industries face intense competition while others enjoy large profits, why some industries offer only bundles, and why some firms buy up their supply chain when others do not. This theoretical course will illuminate un-theoretical implications to your life and future business ventures. This course will use your economic knowledge, a bit of psychology (behavioral economics) and game theory to answer questions like "Why does everyone hate the cable company?" and "Why are CEOs given so many stock options?" (Cross-listed with ECON 8216).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4240 LABOR ECONOMICS (3 credits)**

The course will cover essential topics in Labor Economics including factors leading to equilibrium conditions in the labor market, human capital accumulation, discrimination in the workplace, compensation for undesirable work, mobility, unionization, and more. (Cross-listed with ECON 8246).

**Prerequisite(s):** ECON 2200 OR Equivalent OR Instructor Approval

**ECON 4300 QUANTITATIVE APPLICATIONS IN ECONOMICS AND BUSINESS (3 credits)**

The study and application of modern quantitative techniques to problem-solving in economics and business. It is designed to help the student to translate verbal arguments in economics and business into their mathematical equivalents, to improve analytical skills, and to attain proficiency in marginal analysis, equilibrium analysis, static optimization, and comparative statics analysis. It covers topics such as exponential and logarithmic functions and their applications, linear algebra and its applications, derivatives and their applications, maximization of functions with one variable and multi variables, maximization with non negativity constraints, and integral calculus and its applications in economics and business. (Cross-listed with ECON 8306).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C"(2.0) or better, or permission of instructor.

**ECON 4320 NATURAL RESOURCE ECONOMICS (3 credits)**

This course introduces students to the economics and management of Earth's natural resources. We address questions such as: Are we running out of natural resources? Are we using resources in a sustainable fashion? What role do markets play in resource use? We will address issues related to fossil-based resources, minerals, fisheries, water, land, forests and other associated topics. The course covers the basic theoretical framework for understanding the optimal rate of resource use, identifies the factors that determine the actual rate of use, and considers and evaluates various public policy prescriptions. (Cross-listed with ECON 8326).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4330 ENVIRONMENTAL ECONOMICS AND BUSINESS STRATEGY (3 credits)**

In this course students will apply economic concepts and models to environmental concerns and policy solutions that combat environmental degradation. Topics include: Air and water pollution, solid waste management, carbon taxation, cap-and-trade systems, and economic motivations for environmental business management. (Cross-listed with ECON 8336).

**Prerequisite(s):** MATH 1310 or MATH 1220 and ECON 2200, each with a "C" (2.0) or better. Not open to non-degree graduate students.

**ECON 4340 ECONOMICS OF TECHNOLOGY (3 credits)**

Innovative dynamism is the economic system which brings us the new goods and processes that make life longer and better. We will examine how the system works, including: The role of the breakthrough inventor and the innovative entrepreneur; whether the system improves or hurts ethical behavior, culture, equality, and the environment; the costs to workers in terms of job loss, and the benefits to workers in terms of the creation of better jobs; how funding, regulatory, and patent policies affect innovative dynamism; and how innovative dynamism in medicine can result in more and faster cures for cancer and other diseases. (Cross-listed with ECON 8346).

**Prerequisite(s):** MATH 1310 or MATH 1220 and ECON 2200, each with a "C" (2.0) or better, or BSAD 8180, or permission of instructor.

**ECON 4350 BUSINESS INTELLIGENCE AND REPORTING (3 credits)**

The course will teach students to use state-of-the-art Business Intelligence (BI) software to generate reports and information from data. BI software is used to inform decision-making in industries from transportation to medicine, from marketing to government, and is facilitated by rapidly increasing access to data in all industries. Students will learn to employ best practices in visualization and verbal communication as they are trained to create valuable insights from data and convey those insights to stakeholders. Additionally, the course will aid students in preparing for certification in the use of state-of-the-art BI software. (Cross-listed with ECON 8316).

**Prerequisite(s):** BSAD 2130 (or equivalent) OR Instructor Approval

**ECON 4450 DOMESTIC MONETARY THEORY AND POLICY (3 credits)**

The course will introduce students to topics in money and banking, financial institutions, markets, financial instruments, and monetary theory in order to enhance financial decision making and enable students to effectively analyze economic news in media such as the Wall Street Journal, The New York Times, Business Week, Barrons, The Economist, and other related business publications. This knowledge will enable students to formulate their own views about the current economic environment, government policies, and responses to economic environments. (Cross-listed with ECON 8456).

**Prerequisite(s):** ECON 3220, or permission of instructor.

**ECON 4500 SPECIAL PROBLEMS IN ECONOMICS (2-3 credits)**

Individual investigation of specific problems in the field of economics under the supervision of a faculty member.

**Prerequisite(s):** Senior and permission of department chair.

**ECON 4510 ECONOMIC INTERNSHIP (1-3 credits)**

Students engage in part time employment in their area of concentration to gain relevant business experience and to practice the skills and concepts learned in the classroom. Supplemental reports and/or reading may be required (maximum 3 credit hours).

**Prerequisite(s):** Permission of internship coordinator; 'C' (2.0) or better in ECON 2200 and ECON 2220; 2.5 Cumulative GPA; junior or senior standing.

**ECON 4570 ECONOMIC CONDITIONS ANALYSIS (3 credits)**

This course teaches students how to conduct an economic analysis of, and produce an economic forecast for, a local economy such as a state, county, or metropolitan area. Students will learn where to find data, how to analyze that data, how to develop models with the data, and how to present the data in a clear, concise, and jargon-free manner. The final published report will be authored by the students registered in the course. All students will contribute equally to the final report. The instructor will ensure equal participation. (Cross-listed with ECON 8576).

**Prerequisite(s):** ECON 2200 and ECON 2220, or permission of the instructor

**ECON 4610 INTERNATIONAL TRADE (3 credits)**

An analysis of the character of international economic relations. Subjects covered include the economic basis for international specialization and trade, the economic gains from trade, commercial policy, economic integration and economic growth. (Cross-listed with ECON 8616).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4620 INTERNATIONAL MONETARY THEORY (3 credits)**

This course is designed to introduce students to topic areas in International Macroeconomics and International Finance. Students will examine the mechanisms of the foreign exchange market, and how exchange rates are determined in the short-run as well as in the long-run. Students will investigate the different exchange rate regimes around the world, including fixed exchange rates, floating exchange rates, crawling pegs, and other arrangements. Students will examine the European Union and ask whether such a system is economically viable. This is especially important in the current economic environment facing Europe. Students will also examine exchange rate crises over history, and examine how they all have common elements. (Cross-listed with ECON 8626).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4660 INTERNATIONAL ECONOMIC DEVELOPMENT (3 credits)**

This course introduces theories and application of economic development and growth, economic problems facing developing countries, analyzes domestic economic issues (e.g., per capita GDP, income distribution, population, unemployment, urbanization, education, fiscal policies, and financial policies), and international economic issues (e.g., trade, foreign investment, and foreign debt). Financial crises, debt crises, and economic recovery will be discussed. (Cross-listed with ECON 8666).

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4730 ECONOMICS OF ENTREPRENEURSHIP (3 credits)**

This course will review economic theories of entrepreneurship with special emphasis on Schumpeter's theory of creative destruction. The main focus of the seminar will be on the "high-level" entrepreneurship that sometimes results in major innovations. This course will address the societal benefits of entrepreneurship, factors influencing entrepreneurial success, the policies that best encourage entrepreneurship, and how firms can survive and prosper in an entrepreneurial environment. (Cross-listed with ECON 8736, BSAD 8736).

**Prerequisite(s):** ECON 2200 or permission of the instructor for all students

**ECON 4770 SPORTS ECONOMICS (3 credits)**

Economics is frequently considered an abstract topic, with interesting results that are not easily applied in the real world. Through Sports Economics, students will explore the very real ways in which economics influences sporting competitions and the businesses surrounding them. Students will explore topics such as unionization in sports, discrimination, amateurism, monopoly power, game theory, and more in the context of sports, giving the student a deeper understanding of how these topics apply to real-world problems. After this course, students will understand how readily economics can be applied to businesses and problems in any industry or domain. (Cross-listed with ECON 8256).

**Prerequisite(s):** ECON 2200 OR Equivalent OR Instructor Approval. Not open to non-degree graduate students.

**ECON 4850 ECONOMICS OF URBAN AND REGIONAL DEVELOPMENT (3 credits)**

This course exposes students to the field of Urban Economics with a focus on the latest theories and empirical tools used by economic development experts to measure urban and regional activity and develop strategies for future economic growth and prosperity. As such, students will learn where to find urban and regional data and how to best utilize such data. This combination of theory and practical application is ideal for any student studying economics, business, public policy or political science and those who might be interested business location, urban and rural growth and economic development more generally. (Cross-listed with ECON 8856)

**Prerequisite(s):** MATH 1310 or MATH 1220, ECON 2200 and ECON 2220, each with a "C" (2.0) or better, or permission of instructor.

**ECON 4990 SENIOR ASSESSMENT (0 credits)**

This assessment tool is part of the Department's Student Outcomes effort. It is designed to monitor the Department's performance and to identify changes needed. Graduating seniors must register for and complete this course in the term in which they plan to graduate.

**Prerequisite(s):** Students must register for ECON 4990 in the term in which they plan to graduate. Not open to non-degree graduate students.