Economics

Chairperson: Joseph P. Daniels, Ph.D.
Department of Economics website (http://business.marquette.edu/departments/economics)

Some disciplines train you to be a specialist. The economics discipline is a way of thinking about the world and the factors that influence and shape human actions. Economists have applied their science to the study of many forms of human endeavor. A major in economics gives students a way of analytically reasoning through problems. Whether they are interested in a career in private industry, government, public policy or the nonprofit sector, a degree in economics provides them with the tools to succeed. Being in a vibrant metropolitan area offers a great many advantages to our students, including access to internships with many top firms and organizations within the Milwaukee metro area. Our internships are carefully designed to guarantee that students attain valuable work experience. Students can even gain an inside track on jobs with those firms once they graduate. Our alumni have gone on to successful careers in many different areas including, but not limited to, policy analysts, practicing attorney, futures traders, banking analysts and business consultants.

Major in Economics

The major in economics consists of nine courses (27 credit hours) in economics: four required courses (12 credit hours) and 15 additional credit hours of upper division economics courses. In addition to the economics courses, two mathematics and statistics courses (6-8 credit hours) are required as listed below. Economics (ECON) majors are also required to take two additional social science courses outside of the ECON major. This requirement can be satisfied by taking any two courses that have one or more of the following subject codes: ANTH, CRLS, POSC, PSYC, SOCI, or SOWJ. Courses with the ANTH subject code must be in the area of cultural anthropology rather than biological anthropology.

A minimum grade of C must be earned in each of the major courses, including those numbered 3000 and above, (and including the required core courses: ECON 3003 Intermediate Microeconomic Analysis and ECON 3004 Intermediate Macroeconomic Analysis).

Required Economics Courses:

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<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
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<tbody>
<tr>
<td>ECON 1103</td>
<td>Principles of Microeconomics</td>
<td>3</td>
</tr>
<tr>
<td>ECON 1104</td>
<td>Principles of Macroeconomics</td>
<td>3</td>
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<tr>
<td>ECON 3003</td>
<td>Intermediate Microeconomic Analysis</td>
<td>3</td>
</tr>
<tr>
<td>ECON 3004</td>
<td>Intermediate Macroeconomic Analysis</td>
<td>3</td>
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Electives - Choose five upper-division ECON courses. 15 Credit Hours

Total Credit Hours 27

Required Mathematics and Statistics Courses:

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<tr>
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<th>Title</th>
<th>Credit Hours</th>
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<tbody>
<tr>
<td>MATH 1400</td>
<td>Elements of Calculus (or equivalent or higher-level calculus course)</td>
<td>3</td>
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<tr>
<td></td>
<td>and</td>
<td></td>
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<tr>
<td>MATH 1700</td>
<td>Modern Elementary Statistics (or equivalent or higher-level statistics course)</td>
<td>3</td>
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</tbody>
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Total Credit Hours 6

Note:

• Students contemplating graduate study in economics should take MATH 1450 Calculus 1 and MATH 1451 Calculus 2.
• Students may not take both ECON 3001 Applied Business Economics and ECON 3003 Intermediate Microeconomic Analysis for credit. Since ECON 3003 Intermediate Microeconomic Analysis is a required course, students cannot take ECON 3001 as an elective course for credit.

Economics B.A./M.S.A.E. Accelerated Degree Program

The Department of Economics offers a special five-year program enabling students to earn an undergraduate degree and a Master of Science degree in Applied Economics (M.S.A.E.). For information, consult the Graduate School of Management Bulletin or contact the Department of Economics.

Minor in Economics

The minor in Economics consists of 18 credit hours: two required courses (6 credit hours) and four upper division economics electives (12 credit hours). In addition to the economics course requirements, a basic statistics course (3 credit hours) is required as listed below.

Required:

<table>
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<th>Credit Hours</th>
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<tbody>
<tr>
<td>ECON 1103</td>
<td>Principles of Microeconomics</td>
<td>3</td>
</tr>
<tr>
<td>ECON 1104</td>
<td>Principles of Macroeconomics</td>
<td>3</td>
</tr>
</tbody>
</table>

ECON 1103 Principles of Microeconomics 3
ECON 1104 Principles of Macroeconomics 3
Electives - Choose four upper-division ECON courses.

Total Credit Hours

Additional Statistics Course Requirement:
MATH 1700 Modern Elementary Statistics (or equivalent or higher-level statistics course)

Note:
• Students minoring in Economics are urged to complete one of the following mathematics sequences listed below:

Department of Public Instruction Certification
To pursue Department of Public Instruction certification, College of Education students are required to complete the following requirements for a major in Economics. The major consists of 27 credit hours: four required courses (12 credits) and 15 additional credit hours of upper-division work selected from Groups I - III. An additional 9-11 credit hours in basic statistics and mathematics courses are required as listed below.

Required Courses:
ECON 1103 Principles of Microeconomics
ECON 1104 Principles of Macroeconomics
ECON 3003 Intermediate Microeconomic Analysis
ECON 3004 Intermediate Macroeconomic Analysis

Upper-Division Courses from Groups I-III as listed below:
Group I: Choose one of the following courses.
ECON 4008 Economics and Law
ECON 4070 Economics and Ethics

Group II: Choose two of the following courses.
ECON 4006 Public Policies Toward American Industry
ECON 4010 Public Finance
ECON 4012 Urban and Regional Economics
ECON 4016 Environmental and Natural Resource Economics
ECON 4020 Economics of Labor Markets
ECON 4080 Money, Banking and Monetary Policy

Group III: Choose one of the following courses.
ECON 4040 International Economic Issues
ECON 4044 International Currency Markets
ECON 4045 Comparative Economic Systems
ECON 4046 International Trade
ECON 4047 Development Economics

Economics Elective: Choose one additional upper-division ECON course.

Total Credit Hours

Additional Mathematics Courses Required:
Choose one of the following sequences:
MATH 1390 & MATH 1400 Finite Mathematics and Elements of Calculus (or equivalent)
MATH 1450 & MATH 1451 Calculus 1 and Calculus 2

Required Statistics Course:
MATH 1700 Modern Elementary Statistics (or equivalent)

Total Credit Hours
Courses

**ECON 1001. Introduction to Economics. 3 cr. hrs.**
An introductory survey of economic issues for non-majors with an emphasis on using economic concepts as elements of critical reasoning. Microeconomic topics include markets and the role of government in a market economy. Macroeconomic topics include the banking system, inflation and unemployment. International issues include the balance of trade and foreign exchange. Will not be counted towards the Economics major. Not available for students enrolled in the College of Business Administration.

**ECON 1040. Introduction to the Global Economy. 3 cr. hrs.**
An introductory approach to global economic integration and the forces that determine competitiveness in the global market place. Key issues include: redistributive effects of international trade and offshoring of production, the tradeoff between economic efficiency and equity, ethical questions of the distribution of gains and losses, the development of poorer nations and current issues in the global economy such as population, food, and cultural differences. Credit cannot be earned if ECON 1103 and 1104 have been completed. Prereq: Cannot be taken by students in the College of Business, ECON/BUEC major or minor, INIA major or minor.

**ECON 1103. Principles of Microeconomics. 3 cr. hrs.**
Institutions and processes of market specialization and exchange. Supply and demand and their determinants. Pricing and production decisions of the firm under varying competitive conditions. The role of government in a modern mixed economy. Microeconomic analysis applied to selected economic problems.

**ECON 1103H. Honors Principles of Microeconomics. 3 cr. hrs.**
Institutions and processes of market specialization and exchange. Supply and demand and their determinants. Pricing and production decisions of the firm under varying competitive conditions. The role of government in a modern mixed economy. Microeconomic analysis applied to selected economic problems. As an Honors Program course, includes a more intensive research or project component. Prereq: Admission to Marquette University Honors Program.

**ECON 1104. Principles of Macroeconomics. 3 cr. hrs.**

**ECON 1104H. Honors Principles of Macroeconomics. 3 cr. hrs.**
Processes and determinants of overall economic activity and growth. National income accounting, determination of aggregate income, employment, and the price level. Money and banking, government monetary and fiscal policy, and international economics. As an Honors Program course, includes a more intensive research or project component. Prereq: ECON 1103 and admission to Marquette University Honors Program.

**ECON 1930. Special Topics in Economics. 1-3 cr. hrs.**
Offered as an experimental course to evaluate and determine if a course should be incorporated into the regular curriculum of a program, or courses in the approval process pipeline, but not yet officially approved. Once the same course has been offered twice as a Special Topic, it cannot be offered again until it moves through the curriculum approval process and is approved with a regular curriculum course number.

**ECON 3001. Applied Business Economics. 3 cr. hrs.**
The focus of this course is to explain and develop key economic principles, models, and data that are relevant to business analysis and managerial decision-making. It expands on important economic principles including demand and supply, production and cost, market structures, profit maximization and pricing strategies under varying competitive conditions. Students are expected to develop skills in the practice of using economic models, data and statistical techniques in the process of business decision-making, as well as an understanding of both the usefulness and limitations of such models, data, and techniques. Students may not take both ECON 3001 and ECON 3003 for credit. Prereq: ECON 1103; ECON 1104 and BUAD 1560 or MANA 2028 or equiv.

**ECON 3003. Intermediate Microeconomic Analysis. 3 cr. hrs.**
Reviews the tools of supply and demand analysis. Studies the market behavior of consumers and business firms and the way they interact with each other and with public policy. Applies market theory to questions of resource allocation efficiency, changing market conditions, optimal pricing and output strategies and to important social issues of the day. Students may not take both ECON 3001 and ECON 3003 for credit. Prereq: ECON 1103; ECON 1104; MATH 1400 or equiv.

**ECON 3004. Intermediate Macroeconomic Analysis. 3 cr. hrs.**
Determines levels of aggregate output, employment and prices. Describes available policy variables and their impacts upon the money, bond, goods and labor markets. Looks at inflation and unemployment, international macroeconomic interrelationships and fundamentals of the economic growth process. Prereq: ECON 1103; ECON 1104; MATH 1400 or equiv.

Applied Global Business Learning is a short-term applied global business service learning experience. Under the direction of the instructor, students work with a foreign business venture to solve business problems. In the classroom setting, students learn about the history and culture of the country, as well as the experiences of individuals who have completed a global service project in the region. Students also have the opportunity to learn the realities of developing country business problems. Students help develop a business case solution for the selected project and travel to the location for implementation. Upon completion of the in-country experience, students prepare a post trip report for both the instructor and the entrepreneur and participate in a reflection retreat. Prereq: All application materials completed and cons. of instr.; Jr. stndg.
ECON 3951. MU Led Travel and Study Abroad in Economics. 3 cr. hrs.
Course taught in an international setting by Marquette professors and where students earn Marquette credit. Study Abroad expenses apply. Prereq: Cons. of dept. ch.; Sr. stndg.

ECON 3986. Internship Work Period. 0 cr. hrs.
SNC/UNC grade assessment. Prereq: ECON 3001 or ECON 3003; cons. of prog. dir. and cons. of Business Career Center.

ECON 4006. Public Policies Toward American Industry. 3 cr. hrs.
Role of competition as an economic regulator. Bases and consequences of monopoly power. Development of statutory and administrative law affecting market processes in the U.S. Antitrust policies applied to monopoly, oligopoly, mergers and restrictive trade policies. Alternatives to anti-trust, including utility regulation and social regulation. Prereq: ECON 1103 and ECON 1104.

ECON 4008. Economics and Law. 3 cr. hrs.
Relationship between the rights and obligations which the legal system confers on individuals and the allocation of resources which results from alternative assignments of legal rights. Uses and limitations of economic analysis in explaining the process by which legal rights are conferred. Prereq: ECON 1103 and ECON 1104.

ECON 4010. Public Finance. 3 cr. hrs.

ECON 4012. Urban and Regional Economics. 3 cr. hrs.

ECON 4016. Environmental and Natural Resource Economics. 3 cr. hrs.
Economic analysis of environmental and natural resources including land, air, and water. Special emphasis on the role of human values and economic institutions in resource exploitation. Topics covered include air and water pollution, energy, ocean resources, forestry practices, mineral resources, the population problem, and agriculture. Prereq: ECON 1103 and ECON 1104.

ECON 4020. Economics of Labor Markets. 3 cr. hrs.
Supply and demand conditions unique to markets for services of human beings. The economics of investment and disinvestment of human capital. Topics include: determination of labor force size, geographic distribution and qualitative aspects; economic effects of institutional arrangements and labor laws; current issues. Prereq: ECON 1103 and ECON 1104.

ECON 4022. Economics of Healthcare and Health Policy. 3 cr. hrs.
An introduction to healthcare and health policy from an economics perspective. Covers the demand for and supply of healthcare, moral hazard, adverse selection, and health insurance markets (public and private) using economic evaluation techniques. Also covers the ongoing federal healthcare reform as the Patient Protection and Affordable Care Act of 2010 is the largest piece of health legislation in decades and is dramatically changing the underlying structure and operation of the healthcare sector. Discuss the value of health, externalities and public health, cost containment and managed care in addition to several other health topics. The main goal is to better understand the issues and debates in the vast and rapidly growing field of health economics. Prereq: ECON 1103 and ECON 1104.

ECON 4040. International Economic Issues. 3 cr. hrs.
Survey of international economics. Basis for and welfare effects of international trade, commercial policies, and economic growth. International organizations, trading regions, and trade accords. Balance of payments concepts and exchange rate theories. History and theory of international monetary systems including fixed versus flexible exchange rates. Prereq: ECON 1103 and ECON 1104. Credit not given if ECON 4044 or ECON 4046 has already been completed for credit.

ECON 4044. International Currency Markets. 3 cr. hrs.
Examination of various foreign exchange markets, including the spot, forward, futures and options markets. Risk, pricing and arbitrage procedures for cash and portfolio managers. Exchange rate management, structure of the international financial architecture, and the determination of exchange rates and the balance of payments. The role and practice of global financial intermediaries. Prereq: ECON 1103 and ECON 1104.

ECON 4045. Comparative Economic Systems. 3 cr. hrs.
An analysis and description of institutional differences among national economies. A theoretical framework for analyzing the effects of alternative systems on social and economic behavior is developed. Theoretical models are applied to specific cases, with special emphasis on issues of growth and development in advanced variants of capitalist, post-communist and less-developed economies. Prereq: ECON 1103 and ECON 1104.

ECON 4046. International Trade. 3 cr. hrs.
Sources, patterns, and welfare implications of international trade. Empirical investigations of traditional trade theories. Arguments for and impact of commercial policies. Trade effects of economic growth. Imperfect competition and intra-industry trade as alternatives to traditional theories and views. Prereq: ECON 1103 and ECON 1104.
ECON 4047. Development Economics. 3 cr. hrs.
Traditional economics is concerned with the allocation of scarce resources and emphasizes rationality and self-interest in decision-making. Political economy combines economics and politics to examine how social and institutional processes and power influence the allocation of scarce resources. Development economics deals with the economic, social, political and institutional mechanisms necessary to bring about rapid, large scale improvements in the lives of people in developing economies. Its ultimate goal is to understand the overall process of social and economic change in less developed countries in order to improve the lives of the majority of the world's population. Prereq: ECON 1103 and ECON 1104.

ECON 4060. Introduction to Econometrics. 3 cr. hrs.
Designed to teach how to build an econometric model and to make forecasts using it. Models are constructed to explain phenomena that are observed frequently in business, economics and the social sciences. Linear regression analysis is employed and both single-equation and multi-equation models are investigated. Of practical value to economists, businessmen, engineers, statisticians, and other professionals for whom applied quantitative techniques are important. Prereq: ECON 1103, ECON 1104, and MATH 1700 or equiv.; or ECON 1103, ECON 1104, and BUAD 1560 or MANA 2028 or equiv.

ECON 4065. Introduction to Mathematical Economics. 3 cr. hrs.
Designed to give students the quantitative background required to appreciate the use of mathematics in economic analysis. Emphasis is on developing important techniques. However, many economic applications are incorporated in order to demonstrate how standard economic models can be developed in mathematical terms. Topics include matrix algebra, differential calculus, both constrained and unconstrained optimization and comparative statistics. Prereq: ECON 1103, ECON 1104 and one of the following: MATH 1400, MATH 1410, MATH 1450, MATH 1451, MATH 1455 or MATH 2450.

ECON 4070. Economics and Ethics. 3 cr. hrs.
Examines the relationship between economics and ethics, or how moral values and ethical reasoning underlie both the science of economics and the operation of the economy. Aim of the course is to introduce students to the role of ethical reasoning in economics and economic life, and thereby help create a capacity on their part for ethical reflection and action in connection with economic policy and individual economic experience. Prereq: ECON 1103 and ECON 1104.

ECON 4072. Behavioral Economics. 3 cr. hrs.
An introduction to behavioral economics. People are caring, susceptible to fatigue and sometimes shortsighted or otherwise error prone. Yet in economic models, people are usually assumed to be cold, calculating, tireless, and infinitely farsighted and errorless; they are robot-like! Behavioral economists relax some of the typical assumptions made about people in economic theory. These questions are addressed: Why do people engage in risky behavior, what does it mean for someone to make a gut decision, and how do animal spirits and herd behavior arise in stock markets? Surveys behavioral economic theory and experimental results and investigates some of the implications of behavioral economics for public policy. Prereq: ECON 1103 and ECON 1104.

ECON 4080. Money, Banking and Monetary Policy. 3 cr. hrs.

ECON 4931. Topics in Economics. 1-3 cr. hrs.
Lectures and discussions in an area which, because of its topicality, is not the subject of a regular course. Topics are designated in the Schedule of Classes. Prereq: Jr. stndg.; ECON 1103 and ECON 1104.

ECON 4951. Marquette Led Travel and Study Abroad in Economics. 3 cr. hrs.
Course taught in an international setting by Marquette professors and where students earn Marquette credit. Study Abroad expenses apply. Prereq: Cons. of dept. ch.; Sr. stndg.

ECON 4953. Seminar in Economics. 3 cr. hrs.
Topics vary. Specific titles to be announced in the Schedule of Classes. Prereq: Jr. stndg. and ECON 1103 and ECON 1104.

ECON 4986. Economics Internship - Grading Period. 3 cr. hrs.

ECON 4995. Independent Study in Economics. 1-4 cr. hrs.
Prereq: Cons. of dept. ch.

ECON 4999. Senior Thesis. 2 cr. hrs.
With department approval. Seniors may write a thesis under direction of an adviser. Prereq: Cons. of dept. ch.