

Principles of Microeconomics

Biwei Chen

Chamberlain Center 313

Biwei.chen@houghton.edu

Please Add Email Subject as E210

Office Hours: MWF 4:00-5:00 PM

<https://biweichen-hc.youcanbook.me>

Prerequisite

Basic Algebra and Geometry

Meetings

MWF 10:05-10:55 AM, LIB 303

Description

This course introduces the foundations of economic analysis and explanation with a Christian perspective. It follows the classical themes of Adam Smith in the *Wealth of Nations*, highlights the economic ways of thinking and quantitative reasoning, and applies economic principles to a wide range of real-world phenomena. Topics include the nature of economics, social competition and rules, production and exchange, international trade, consumer choices, business decisions, market equilibrium and welfare, government taxation and intervention, market efficiency and failure, externalities and Coase theorem. Format: lectures and discussions, polls and quizzes, problem sets, two exams, and a faith integration essay.

Objectives

The course develops basic analytical frameworks for decision making and public policy analysis. The main goal is to instill economic intuition that can help students better understand the society, individual and business decisions. Moreover, students will acquire foundational theories and quantitative skills to solve economic problems intuitively, graphically, and mathematically. Students will also reflect on how Christian faith could make a difference in the decision-making process.

Upon completing this course, students should be able to

- Explain the nature and scope of economics and its scientific foundations
- Understand competitive criteria and “rules of the game” in social competition
- Apply efficiency and equity principles to private decisions and public policies
- Build the opportunity cost framework and perform marginal equalization analysis
- Appreciate the driving forces behind exchange and the benefits of international trade
- Model consumer behavior, producer behavior, and how their decisions affect markets
- Apply the law of consumption, the law of production, and the law of demand and supply
- Analyze the market competition effects and contrast perfect competition to monopoly markets
- Develop the demand-supply model to analyze market fluctuations and government public policy
- Characterize factor market equilibrium, model income distribution and measure income inequality
- Evaluate market efficiency, examine market limitations, and identify the sources of market failures

Textbook

Biwei Chen, 2021, *Foundations of Economic Analysis and Explanation*. Cognella. ISBN: 978-1-7935-6737-6. Digital textbook materials will be provided to students free of charge. For a paperback color-print copy, students can order online (\$34.95 + \$9 delivery) <https://store.cognella.com/23793>. To render an affordable textbook to students, the author has waived all royalties for this publication.

Moodle

Please log in Moodle to check regularly for announcements, lecture slides, assignments, readings, exam guides, and grades. Lecture slides will be posted ahead of class meetings. Students shall read the slides before the lecture, take notes during the lecture, and review afterwards. Please note that the textbook slides are not complete, and students are advised to take hand notes (including equations, models and graphs). If absent, it is the student's responsibility to contact the instructor or find a classmate to fill in the blanks.

Evaluation

Student evaluation consists of Problem Sets (30%), Midterm Exam (30%), Final Exam (30%), and Faith Integration Essay (10%). The overall evaluation is a letter grade converted from the percentage scale taking into account the entire class distribution.

- Problem sets will be assigned every week. There are problem sets with quantitative applications of economic theories and models. Students cannot copy from each other and must submit independent solutions. Plagiarism, misrepresentation, and unauthorized collaboration will result in a zero grade and the matter being report to the dean. Assignment deadlines are firm and late submission will not be accepted except for a medical or family emergence (provided a valid document within 2-3 days). Refer to the Assignments folder for deadlines, grading rubrics, and submission instructions.
- Midterm and final exams will NOT be rescheduled because of travel and other personal arrangements. In the case of a documented emergency or conflicts with the scheduled exam date, a make-up exam will be given only with the pre-approval from the department chair. Refer to Exam Folder for exam schedules, guidelines, practice questions, and policies. Cheating on exams will result in failing the course and the matter being reported to the Dean.
- Faith integration essay. By the end of semester, students will reflect on the relationship between Christian faith and Economics and submit a 2- to 3-page essay. Plagiarism, misrepresentation, and unauthorized collaboration will result in a zero grade and the matter being report to the dean.
- Attendance and classroom policy. In-person attendance and punctuality are expected. More than three unexcused absences will result in 10% off the total grade; more than six absences will result in a 20% off. Arriving late twice is counted as an absence. For emergency absences, students are responsible for contacting the instructor within the week with a valid excuse document. Cellphones and other digital devices are not permitted during the lectures and exams unless otherwise instructed. Please maintain mutual respect and courtesy throughout the class. Inappropriate classroom behaviors will be reported to the Dean and the students may be expelled from the class.

Grading Metrics and Letter Grades (based on a 100% scale)			
S=scores	B+ $75 \leq S < 80$	C+ $60 \leq S < 65$	D+ $S < 50$
A $S \geq 85$	B $70 \leq S < 75$	C $55 \leq S < 60$	D $45 \leq S < 50$
A- $80 \leq S < 85$	B- $65 \leq S < 70$	C- $50 \leq S < 55$	F $S \leq 40$

Tentative Schedule

Week	Topics	Lecture
W1	Course Logistics & Overview Introduction The Scientific Methodology in Economics	L1 L2
W2	Scarcity, Competition and Social Rules The Opportunity Cost and Applications	L3 L4
W3	World Trade Facts and Patterns Classical Trade Theory and Model	L5
W4	The Theory of Value and Market Exchange	L6
W5	Consumer Choice Theory: Utility and Preference Consumer Choice Theory: Utility Maximization	L7 L8
W6	The Law of Demand: Quantity Demanded vs Demand The Law of Demand: Price Elasticity and Applications	L10 L11
W7	Review Session & Midterm Exam: TBA	
W8	Production Theory: Output and Technology	L12 L13
W9	Production Theory: Cost and Profit	L14 L15
W10	Market Structure and Business Decision Perfect Competition vs Monopoly Firms	L16
W11	Demand and Supply Model: Market Equilibrium Demand and Supply Model: Welfare Analysis	L17
W12	Market for Production Factors: Income Distribution Theory Market for Production Factors: Income Inequality Measure	L18
W13	Market Intervention Policies: Price Control Market Intervention Policies: Quantity Restriction	L19
W14	General Equilibrium and Market Efficiency Market Failures and the Coase Theorem	L20
W15	Review Session & Final Exam: Dec 15 W 8:00-10:00 AM	

Last day to add/drop: Sep 3. Last day to withdraw: Nov 8. No class meetings on Oct 18 M and Nov 24-28.
<https://www.houghton.edu/current-students/registrar/calendars-important-dates-and-daily-schedules/>

Academic Honesty

Honesty is the foundation on which all intellectual endeavors rest. To use the ideas of others without acknowledging the authors of those ideas belies the nature and purpose of academic life. At Houghton, where we strive to live out Christian calling and commitment, personal integrity, including academic honesty, should be the hallmark of all our work and relationships. Students are expected to exhibit extreme care relative to personal honesty in all academic work, including in-class and out-of-class learning experiences, such as exams, quizzes, journals, papers and research projects. Violation of the academic honesty code will result in a failing grade/course failure/college dismissal with the matter being report to the Academic Dean. Refer to Houghton College Catalog page 40 for detailed description and policies.

<https://www.houghton.edu/wp-content/uploads/2021/02/2020-21-hc-catalog.pdf#page=40>

Accessibility Services

If you have an academic or physical disability that requires accommodations it is up to you to self-report any such disability to the office of Academic Support and Accessibility Services in the Center for Student Success located on the first floor of the Chamberlain Center (585-567-9622). With appropriate documentation, you will be afforded the necessary accommodations. For more information, please go to

<https://www.houghton.edu/current-students/center-for-student-success/academic-support-and-accessibility-services/>

COVID-19 Health Safety

Masking is still required of all individuals in campus buildings unless an individual is in their residence hall room or office. Social distancing continues to be strongly encouraged of all people, particularly in environments where you do not know the vaccination status of others, though is not required outside of classrooms. Individuals who are outdoors and are not socially distanced from others are encouraged to be masked. (As of Aug 24, Dean of Students, marc.smithers@houghton.edu)

Student Wellness and Success

<https://www.houghton.edu/current-students/center-for-student-success/writing-center/>

<https://www.houghton.edu/current-students/center-for-student-success/counseling-services/>

<https://www.houghton.edu/current-students/center-for-student-success/office-of-vocation-and-calling/>

Learning and Teaching Philosophy

It's my teaching philosophy and goal that Economics shall be fun, useful, and applicable. It is fun because there are lots of interesting social phenomena Economics can explain very well; useful because it applies in our daily life beyond schools; applicable because it provides a scientific way of thinking for solving decision-making problems. Throughout the course, it is important for students to contact the instructor to ensure positive learning and teaching experience. If students have trouble keeping up with the class material or the workload, please feel free to reach out to the instructor. It is the instructor's responsibility to support students in making progress and help students succeed in the course. Students are strongly encouraged to 1) raise questions and participate in the lecture and discussion; 2) provide feedback and suggestions regarding teaching and course organization; 3) solve problem sets and review lectures in a group and alone; 4) seek advice from the instructor to improve academic performance.

How to Get the Most Out of this Course

Students shall read the textbook lecture slides ahead of time, take notes during the lectures, and review the lectures afterwards with your study group and alone.

- Follow the readings ahead of lecture (textbooks or slides)
- Take notes during lectures (lecture slides are incomplete)
- Pay attention to course announcements and instructions
- Start early to work on assignments in groups and alone
- Review the lectures afterwards with your study group
- Seek help and guidance when you need or get stuck
- Attend lectures and office hours to solve problems
- Practice makes perfect. Ask, ask, ask questions

Houghton College “Time-on-Task”

Learning activity	Comments and formats	Minimum time on task	Total hours
Ahead-of-lecture reading: slides	Overview topics/concepts Prepare to ask questions	About 30 to 60 minutes for each lecture	10 to 20 hours
Classroom meetings	Rigorous introduction, analysis, and Q&A	About 50 minutes per meeting including polls & quiz	40 hours
Polls & quizzes	In-class interactive learning Basic concept reviews	About 5 to 10 minutes per lecture activities	8 hours
Post-lecture review	Focus on lecture notes, examples & applications	About 1 to 2 hours per week for previous lecture slides and notes	15 to 30 hours
Weekly problem sets	Short answer, analytical/quantitative applications	About 3 to 4 hours per week	40 to 50 hours
Exam preparation	Multiple choice questions Basic concepts & analysis	Midterm preparation: 10-15 hours Final preparation: 15-20 hours	25 to 35 hours
Faith integration essay	Two to three pages: Relationship between Christian faith & Economics	Proposal: 2 to 5 hours First draft: 8-10 hours Final draft: 5-10 hours	15 to 25 hours
		Total time expected: 145-200 hours	

Note: Calculation based on a total of 20 topical lectures and about 45 classroom meetings (3 credit).

Online Textbooks

- OpenStax: Principles of Microeconomics 2e. Downloadable <https://cnx.org>
- Principles of Microeconomics by Emma Hutchinson, University of Victoria
<https://pressbooks.bccampus.ca/uvicecon103/>
- CoreEcon: Economics for a changing world
<https://www.core-econ.org/espp>
<https://core-econ.org/the-economy>
<https://www.core-econ.org/insights>
<https://www.core-econ.org/doing-economics>
<https://www.core-econ.org/experiencing-economics>

Online Courses

- Hawkes TV – Math Review for Economics
<https://tv.hawkeslearning.com/MICRO.htm>
- MRU – Principles of Microeconomics
<https://mru.org/principles-economics-microeconomics>
- Khan Academic – Microeconomics
<https://www.khanacademy.org/economics-finance-domain/microeconomics>

Web Resources

- <https://www.econlib.org>
- <https://www.weforum.org>
- <https://www.econedlink.org>
- <https://www.aeaweb.org/resources>
- <https://www.federalreserveeducation.org>
- <https://www.frbsf.org/education/teacher-resources>
- <https://www.nobelprize.org/prizes/economic-sciences>
- <https://research.stlouisfed.org/publications/page1-econ>

Council for Economic Education <https://vimeo.com/councilforeconed/videos>

Foundation for Economic Education <https://fee.org/articles/topics/Economics>

Learn Liberty Economics <https://www.learnliberty.org/videos/?topics=basic-economics>

Economic Lowdown <https://www.stlouisfed.org/education/economic-lowdown-video-series>

Economic Lowdown Podcast <https://www.stlouisfed.org/education/economic-lowdown-podcast-series>

Foundational Concepts <https://www.libertarianism.org/videos/foundational-concepts-economics-introduction>