

Economics 9452: Advanced Microeconomic Theory II

Spring 2019

Instructor: Dr. X. H. Wang
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Office Hours: 1pm – 3pm Tuesdays, or by appointment

Class Time and Location: T 3pm – 5:30pm Econ Conference Room

Course Webpage: Canvas at <https://courses.missouri.edu/>

Course Description: Microeconomic theory is a set of analytical tools designed to help us understand economic phenomena. The basic assumptions that underlie the theory are that individuals pursue well-defined objectives, take into account their knowledge of the environment and in strategic situations take into account their expectations of other individuals' behavior. Microeconomic models are abstract representations of collections of real-life situations and microeconomics uses mathematics to express its ideas formally. This course is a continuation of Economics 9451. Topics of this course include theory of choice under uncertainty, general equilibrium, game theory, imperfect competition, and theory of information.

Textbooks:

David Mandy, **Producers, Consumers, and Partial Equilibrium**, 2017 (Mandy)

Andreu Mas-Colell, Michael Winston, and Jerry Green, **Microeconomic Theory**, 1995 (MWG)

Supplementary Materials:

Guoqiang Tian, **Lecture Notes: Microeconomic Theory**, 2018 (GT)
<http://people.tamu.edu/~gtian/microeconomic%20theory-2018-01.pdf>

Grading: Grades for the course will be determined by class participation and homework assignments (10%), a midterm exam (45%), and a final exam (45%).

Exam Schedule: Test I March 12 Tuesday
 Test II TBA

Make-up Exams: Make-up exams will generally not be given. A request for alternative arrangements must be in writing and must be accompanied by appropriate documentation for not taking the scheduled exam.

Course Outline

1. Theory of Choice under Uncertainty

- expected utility theory
- risk aversion
- choice under uncertainty

Readings: Chapter 6 (MWG); Chapter 4 (GT)

Other readings:

Arrow, K. (1965) Aspects of the Theory of Risk-Bearing, Yrjo Jahnssonin.

Pratt, J. (1964) "Risk aversion in the small and in the large," *Econometrica*, 122-136.

Von Neumann, J. and O. Morgenstern (1944) Theory of Games and Economic Behavior, Princeton University Press.

2. General Equilibrium

- pure exchange economy
- Walrasian equilibrium
- first and second fundamental theorems of welfare economics

Readings: Chapters 15-17 (MWG); Chapters 7-8 (GT)

Other readings:

Arrow, K. and G. Debreu (1954) "Existence of equilibrium for a competitive economy," *Econometrica*, 265-290.

Arrow, K. and F. Hahn (1971) General Competitive Analysis, Elsevier Science Publishing.

Debreu, G. (1959) Theory of Value, Wiley.

Samuelson, P. (1947) Foundations of Economic Analysis, Harvard University Press.

3. Game Theory

- simultaneous games
- sequential games

Readings: Chapters 7-9 (MWG); Chapter 5 (GT)

Other readings:

Luce, R. and H. Raiffa (1957) Games & Decisions, New York: Wiley.

Myerson, R. (1999) "Nash equilibrium and the history of economic theory," *Journal of Economic Literature*, 1067-1082.

Nash, J. (1951) "Non-cooperative games," *Annals of Mathematics*, 289-295.

4. Oligopoly

-- oligopoly

Readings: Chapter 15 (Mandy); Chapter 12 (MWG)

Other readings:

Tirole, J. (1988) The Theory of Industrial Organization, MIT Press.

5. Information Economics

-- adverse selection

-- signaling

-- screening

-- principal-agent problem

Readings: Chapters 13-14 (MWG); Chapters 13-14 (GT)

Other readings:

Akerlof, G. (1970) "The market for lemons: quality uncertainty and the market mechanism," *Quarterly Journal of Economics*, 488-500.

Rothschild, M. and J. Stiglitz (1976) "Equilibrium in competitive insurance markets: an essay on the economics of imperfect information," *Quarterly Journal of Economics*, 629-649.

Spence, M. (1974) "Job market signalling," *Quarterly Journal of Economics*, 355-374.

ACADEMIC INTEGRITY POLICY

Academic honesty is fundamental to the activities and principles of a university. All members of the academic community must be confident that each person's work has been responsibly and honorably acquired, developed, and presented. Any effort to gain an advantage not given to all students is dishonest whether or not the effort is successful. The academic community regards academic dishonesty as an extremely serious matter, with serious consequences that range from probation to expulsion. When in doubt about plagiarism, paraphrasing, quoting, or collaboration, consult the course instructor.

Academic Dishonesty includes but is not necessarily limited to the following:

- A. Cheating or knowingly assisting another student in committing an act of cheating or other academic dishonesty.
- B. Plagiarism which includes but is not necessarily limited to submitting examinations, themes, reports, drawings, laboratory notes, or other material as one's own work when such work has been prepared by another person or copied from another person.
- C. Unauthorized possession of examinations or reserve library materials, or laboratory materials or experiments, or any other similar actions.
- D. Unauthorized changing of grades or markings on an examination or in an instructor's grade book or such change of any grade report.

ACADEMIC INTEGRITY PLEDGE: *"I strive to uphold the University values of respect, responsibility, discovery, and excellence. On my honor, I pledge that I have neither given nor received unauthorized assistance on this work."* Students are expected to adhere to this pledge on all graded work whether or not they are explicitly asked in advance to do so.

The University has specific academic dishonesty administrative [procedures](#). Although policy states that cases of academic dishonesty must be reported to the Office of the Provost for possible action, the instructor may assign a failing grade for the assignment or a failing grade for the course, or may adjust the grade as deemed appropriate. The instructor also may require the student to repeat the assignment or to perform additional assignments. In instances where academic integrity is in question, faculty, staff and students should refer to [Article VI of the Faculty Handbook](#). Article VI is also available in the [M-Book](#). Article VI provides further information regarding the process by which violations are handled and sets forth a standard of excellence in our community.

ADA STATEMENT (FROM OFFICE OF THE PROVOST)

If you anticipate barriers related to the format or requirements of this course, if you have emergency medical information to share with me, or if you need to make arrangements in case the building must be evacuated, please let me know as soon as possible.

If disability related accommodations are necessary (for example, a note taker, extended time on exams, captioning), please establish an accommodation plan with the Disability Center (<http://disabilitycenter.missouri.edu>), S5 Memorial Union, 573-882-4696, and then notify me of your eligibility for reasonable accommodations. For other MU resources for persons with disabilities, click on "Disability Resources" on the MU homepage.

THE DEPARTMENT OF ECONOMICS EXAM ACCOMMODATION PROCEDURE FOR STUDENTS WITH DISABILITIES:

1. A disabled student who wants accommodations for an exam in Economics course must present the course instructor with a Letter of Accommodation from the Office of Disability Services (ODS)

that documents the accommodations the student is entitled to receive. This should be done as early in the semester as possible.

2. For each accommodated exam, the student should bring the course instructor an Adaptive Examination Request Form from ODS. The course instructor is not required to accept such a request unless the student has first provided you with a Letter of Accommodation. ODS policies require that this form be provided to you at least 7 business days in advance for hourly examinations and by Thanksgiving Break (Spring Break) for fall (spring) final examinations.
3. The student section of the form must be properly filled out (including consistency with the Letter of Accommodation regarding the accommodations) and signed by the student. The course instructor must fill out the instructor portion including a note in the SPECIAL INSTRUCTIONS box and sign the form.
4. The white and pink copies of the form are given back to the student and the student must submit the white copy to ODS.

Audio/Video Recording

University of Missouri System Executive Order No. 38 lays out principles regarding the sanctity of classroom discussions at the university. The policy is described fully in Section 200.015 of the Collected Rules and Regulations. In this class, students may not make audio or video recordings of course activity, except students permitted to record as an accommodation under Section 240.040 of the Collected Rules. All other students who record and/or distribute audio or video recordings of class activity are subject to discipline in accordance with provisions of Section 200.020 of the Collected Rules and Regulations of the University of Missouri pertaining to student conduct matters.

Those students who are permitted to record are not permitted to redistribute audio or video recordings of statements or comments from the course to individuals who are not students in the course without the express permission of the faculty member and of any students who are recorded. Students found to have violated this policy are subject to discipline in accordance with provisions of Section 200.020 of the Collected Rules and Regulations of the University of Missouri pertaining to student conduct matters.

INTELLECTUAL PLURALISM STATEMENT (FROM OFFICE OF THE PROVOST)

The University community welcomes intellectual diversity and respects student rights. Students who have questions concerning the quality of instruction in this class may address concerns to either the Departmental Chair or Divisional leader or Director of the [Office of Students Rights and Responsibilities](http://osrr.missouri.edu/) (<http://osrr.missouri.edu/>). All students will have the opportunity to submit an anonymous evaluation of the instructor(s) at the end of the course.