

University of International Business and Economics

University of International Business and Economics International Summer School

ECON 230 Game Theory

Instructor: Paul Schweinzer Email: <u>Paul.Schweinzer@aau.at</u> Credit: 2 units

Students

Freshman and sophomore

Teaching Language

This course is taught in English.

Prerequisites

Basic calculus, microeconomics desired

Methods of Instruction

Teaching, cases analyzing and seminar, debates on topics between groups of students

Classroom Capacity

50

About the Instructor

Professor Schweinzer is a professor of economics at the University of Klagenfurt in Austria. His research interest includes game theory, mechanism design, contract theory, and microeconomics. His research has been published in top economic journals include Journal of Economic Theory, RAND Journal of Economics, Games and Economic Behavior. Professor Schweinzer is also a co-editor of the Journal of Mechanism and Institution Design.

Course Description

The course introduces the main ideas, concepts and tools of modern game theory with the aim to apply key concepts to problems in contract theory and microeconomics. The course is composed of a complete information part and an information economics part. If there is sufficient time, the course will also include short discussions of both auction theory and (cooperative) matching problems.

Syllabus

- 1. Intro & Strategic form games I
- 2. Strategic form games II
- 3. Extensive form games



- 4. Games of incomplete information
- 5. Information economics I: Adverse selection
- 6. Information economics II: Principal-agent model
- 7. Standard auctions

Reference Readings

Gibbons, R. (1992): A Primer in Game Theory. Harvester-Wheatsheaf, Hemel Hempstead, Herfordshire.

Macho-Stadler, I., and J. D. P' erez-Castrillo (1997): An Introduction to the Economics of Information. Oxford University Press, Oxford.