

Dr. Jonathan Schiller

VWL IG: International Governance jonathan.schiller@uni-bayreuth.de www.governance.uni-bayreuth.de/en

Winter Semester 2022/2023

Interactive Case-Study Seminar:(33030/30026 - 2 SWS)Introduction to Decision and Game Theory

(Fallstudienseminar in englischer Sprache)

1. Course Description

This seminar deals with the basic concepts of decision and game theory and how these can be applied to make rational and wise choices in real-life situations. Students are supposed to rethink their own decision-making, acquire the necessary techniques and methods to decide and play rationally, an learn the correct terminology to communicate their decisions to others.

2. Intended Learning Outcomes

At the end of this seminar course students will have acquired

- 1. an understanding of the key concepts of classical decision theory, game theory, and collective choice,
- 2. a basic ability to systematically structure real-world problems within a decision-theoretic framework,
- 3. a basic ability to analyze a real-world problem with decision-theoretic solution concepts at an introductory level,

3. Pre-requisites

None.

4. Teaching and Learning Strategies / Seminar Programme

This is an intensive seminar course that will provide students with an introduction to the three main areas of decision theory:

- 1. Decisions under uncertainty and risk (classical decision theory)
- 2. Strategic decision-making (game theory)
- 3. Committee decision-making (collective choice)

Complementing the three lectures on these topics, students will define and solve a selection of case studies in working groups of 4 or 5, and present their analyses in class. The lecture will further be complemented by exercise sessions.

5. Seminar Course Schedule

The seminar course is provided via two blocked seminars on two days each. These will take place as follows:

| Course No. | Day | Date | Time | Room |
|------------|-----------------|-----------|---------------|------|
| 30026 | Friday-Saturday | 18-19 Nov | 09:00 - 18:00 | S68 |
| 33030 | Friday-Saturday | 09-10 Dez | 09:00 - 18:00 | S68 |

6. Assessment

Economics (BA) and IWE students:

- One hour unseen written examination.
- The date of the examination can be found on https://www.bwl5.unibayreuth.de/ de/studiendekan/Klausurtermine/
- Students have to register for the examination via CAMPUSonline.

Furthermore, for passing the seminar course students are expected to participate in all seminar sessions.

7. Reading Resources

Required pre-reading: none

As the teaching and learning concept is based on structuring intuitive analyses no prior reading material will be distributed as this would interfere with the didactical concept.

Recommended reading:

Students will be given a list of recommended reading at the beginning of each of the seminar session.

8. Accreditation

Economics (BA):

Modulbereich SQ: Schlüsselqualifikation / Modul SQ3: Fallstudienseminar in englischer Sprache

IWE:

Modulbereich SQ: Schlüsselqualifikation / Modul SQ2b: Fallstudienseminar

9. Registration

Registration is conducted via CampusOnline.

Note: Given the nature of the seminar course priority in the allocation of places will be given to Economics and IWE students in the 1st and 2nd semester.

10. Responsible Student Assistants for this Seminar

All requests regarding this seminar should, in the first instance, be addressed to:

Manja Melcher: <u>manja.melcher@uni-bayreuth.de</u>

Document last revised: 07 November 2022