

# FAG3006 Theory and Analysis of Decision-making 7.5 credits

#### Beslutsteori och Beslutsanalys

This is a translation of the Swedish, legally binding, course syllabus.

If the course is discontinued, students may request to be examined during the following two academic years

#### **Establishment**

Course syllabus for FAG3006 valid from Spring 2020

## **Grading scale**

P, F

## **Education cycle**

Third cycle

# Specific prerequisites

# Language of instruction

The language of instruction is specified in the course offering information in the course catalogue.

### Intended learning outcomes

The course will provide participants with a broad and multi-dimensional understanding of decision making processes based upon established and emerging key approaches within the

social sciences. Participants will further gain the ability to practically apply these perspectives to the analysis of concrete episodes of decision making. After completing the course participants will also be able to discuss and problematize decision making situations from the perspective of their ethical and sustainability aspects.

After successfully completing the course, participants will be able to:

- Critically discuss and comparatively assess the contextual relevance of classical and contemporary social scientific theories of decision making
- Apply the presented theories of decision making in the analysis of real-life cases of decision making within planning and policy processes
- Analyze how diverse formal and informal contexts influence how decision making processes unfold
- Problematize how ambiguities, complexities and power relations affect decision making processes and their outcomes
- Demonstrate and discuss ethical challenges and dilemmas associated with decision making processes
- Analyze decision making processes from the perspective of sustainability

#### Course contents

This course provides an introduction to decision analysis as it is currently practiced within the critical social sciences. Students in the course will gain a nuanced understanding of established approaches to the analysis of decision making, as well as recent developments in the field. The course introduces a number of key themes in decision theory and also provides opportunities for students to relate this knowledge to their own areas of interest and a basic ability to apply the discussed theories in an analysis of their own research materials.

The course primarily focuses on the application of descriptive analysis of decision making in planning and policy processes within variegated organizational, political and cultural contexts. However, it also more briefly introduces the students to classical normative decision theories, as well as analyses of decision making from the perspective of the individual. Some of the key themes in the course relate to decision making rationality, rules of decision making, power in decision making, negotiations, complexity an ambiguity, ethics of decision making and decision analysis, tools for decision making and decision engineering. A carrying theme in the course is also sustainability aspects of decision making, which will feature recurrently in the course activities. Throughout the course, these themes function as bases for developing applied analyses of concrete cases of decision making.

The course is primarily based upon the participants' individual essay in which the theoretical perspectives presented in the course literature are applied in a thorough analysis of a decision making process of their choice ('case'). Regular seminar assignments will function as a support in the development of these analyses, as well as recurrent seminars in which the case analyses-in-progress will be presented and discussed. Lectures and workshops provide broadened perspectives on the course themes. The finalized case analyses will then be presented for feed back from the course teacher and fellow participants in a final seminar.

#### **Examination**

• HEM1 - Home assignments, 7.5 credits, grading scale: P, F

Based on recommendation from KTH's coordinator for disabilities, the examiner will decide how to adapt an examination for students with documented disability.

The examiner may apply another examination format when re-examining individual students.

The examination will be based on

- 1. active seminar participation;
- 2. completion of seminar assignments;
- 3. completion of individual assignment.

The course is graded Pass/Fail. Any absence from mandatory course activities or failure to deliver assignments according to deadline will demand compensatory work.

## Ethical approach

- All members of a group are responsible for the group's work.
- In any assessment, every student shall honestly disclose any help received and sources used.
- In an oral assessment, every student shall be able to present and answer questions about the entire assignment and solution.