

# **COURSE SYLLABUS**

# Systems Thinking Competence, 2.5 credits

Systems Thinking Competence, 2,5 högskolepoäng

Course Code: JSTK15

**Confirmed by:** Council for Undergraduate and Masters Education Jun 12, 2023

Valid From: Jan 13, 2025

Version:

**Education Cycle:** First-cycle level Disciplinary Social sciences

domain:

Subject group: FE1 Specialised in: G1F

Main field of study: Business Administration

# Intended Learning Outcomes (ILO)

On completion of the course, the students will be able to:

# Knowledge and understanding

I. explain systems mapping approaches for exploring sustainability challenges,

#### Skills and abilities

2. apply system mapping tools, including system dynamics, to analyse sustainability challenges, Judgement and approach3. Assess the effects of the relationships within (sub)systems in the ethical, social, ecological, and economic dimensions of sustainability

# Judgement and approach

3. Assess the effects of the relationships within (sub)systems in the ethical, social, ecological, and economic dimensions of sustainability

#### Contents

The course presents tools and methods of system dynamics to build abilities to examine systems and sustainability challenges. These abilities are core to build a complexity awareness that allows students to work with complex and systemic conditions and causalities as well as understand patterns in line with the Inner Development Goals. Through the course, the students learn to model and analyse conditions, causalities, and consequences of systems as well as design interventions for sustainable enterprise development with a systems perspective. The topic covered in the course include:

- Systems dynamics modelling methods, including their main elements and logic, to be implemented in sustainability challenges.
- IT-supported tools for systems mapping and modelling interventions for sustainable enterprise development.
- Hands-on exercises and case studies to apply the theory and knowledge in a real-world or simulated setting.

#### Connection to Research and Practice

The course is based on research and tools on system thinking and sustainability. Through analysing and applying selected materials, the students examine the theories and tools in cases and learn about the systems analysis and implications of introducing and working with systems thinking. The course is core to MMTC and CeFEO research centre where research on sustainability and transformation has been initiated. Through problem-based learning the course stimulates the development of students' system thinking competence as proposed by the Inner Development Goals. The course activities foster the ability to understand the patterns, interdependency of (sub)systems, cascading effects, feedback loops, and accompanying behaviors.

# Type of instruction

Lectures, seminars, guest lectures, group projects, discussions, and presentations.

The teaching is conducted in English.

# **Prerequisites**

General entry requirements and taken courses of 15 credits in Business Administration and/or Economics including the course Sustainability Challenges and Systems, 5 credits (or the equivalent).

# **Examination and grades**

The course is graded A, B, C, D, E, FX or F.

Individual assignments (ILOs: 1, 2 & 3) representing 2,5 credits.

# Registration of examination:

Name of the Test	Value	Grading
Individual assignments <sup>1</sup>	2.5 credits	A/B/C/D/E/FX/F

<sup>&</sup>lt;sup>I</sup> All parts of the compulsory examination in the course must be passed with a passing grade (A-E) before a final grade can be set. The final grade of the course is determined by the sum total of points for all parts of the examination in the course (o-100 points). Grade is set in accordance to JIBS grading policy.

## Course evaluation

It is the responsibility of the examiner to ensure that each course is evaluated. At the outset of the course, the programme evaluators in the course must be contacted. In the middle of the course, the examiner should meet the programme evaluators to identify strengths/weaknesses in the first half of the course.

At the end of the course, the examiner should remind students to fill in the survey. The examiner should also call a meeting with the programme evaluators to debrief the course, based on course evaluation data and comments. The next time the course runs, students should be informed of any measures taken to improve the course based on the previous course evaluations.

At the end of each study period, JIBS' Director of Quality and Accreditation crafts a "Course Evaluation Quarter Report", presenting the quantitative results from course evaluation surveys.

The Associate Dean of Education, The Associate Deans of Faculty, Programme Directors, and JSA President and Quality receive the report.

#### Other information

Academic integrity

JIBS students are expected to maintain a strong academic integrity. This implies to behave within the boundaries of academic rules and expectations relating to all types of teaching and examination.

Copying someone else's work is a particularly serious offence and can lead to disciplinary action. When you copy someone else's work, you are plagiarising. You must not copy sections of work (such as paragraphs, diagrams, tables and words) from any other person, including another student or any other author. Cutting and pasting is a clear example of plagiarism. There is a workshop and online resources to assist you in not plagiarising called the Interactive Anti-Plagiarism Guide.

Other forms of breaking academic integrity include (but are not limited to) adding your name to a project you did not work on (or allowing someone to add their name), cheating on an examination, helping other students to cheat and submitting other students work as your own, and using non-allowed electronic equipment during an examination. All of these make you liable to disciplinary action.

## **Course literature**

A list of articles will be supplied at the course introduction.