

School of Economics and Management

SYSA12, Informatics: Information Systems and Business, 30 credits

Informatik: Informationssystem och verksamhet, 30 högskolepoäng First Cycle / Grundnivå

Details of approval

The syllabus was approved by The Board of the Department of Informatics on 2013-09-20 and was last revised on 2024-09-18. The revised syllabus comes into effect 2024-09-18 and is valid from the spring semester 2025.

General information

The course is compulsory within the Bachelor's Programme in Design of Information Systems.

Language of instruction: Swedish and English The course is given in Swedish but there may also be teaching in English. The course literature is mainly in English.

Main field of study	Specialisation
Information Systems	G1F, First cycle, has less than 60 credits in first-cycle course/s as entry requirements

Learning outcomes

On completion of the course, the student shall have obtained knowledge of relevance for work with practical development of information technology (IT) and information systems (IS) within the fields of group dynamics and communication, organisation, business and IT/IS, project management, interaction design, IT law and IS projects.

Knowledge and understanding

To pass the course, the student must demonstrate knowledge of and understanding of

- basic theories, models and concepts within group psychology
- conversation and interview methodology

- the impact of the design and use of IS on organisations, activities and individuals
- the impact of the needs and requirements of organisations on the use, design and introduction of IT and IS
- the knowledge development, problems and prerequisites of project management
- their different roles, areas of responsibility and cooperation in a development process
- the life cycle and different phases of a project
- the context and stakeholders of a project
- choices of interaction-oriented methods
- interaction design and development of sustainable IS solutions
- legal rules that are relevant to development and use of information technology

Competence and skills

To pass the course, the student must demonstrate competence and skills individually or in groups to

- use simple methods to structure, support and evaluate the cooperation in a study or working group
- use methods and models to analyse problems and prerequisites for the development of IS solutions
- explain how an IS design contributes to the improvement of an organisation and its activities
- identify the need of different roles and areas of responsibility in a project
- plan, carry out and report an IS project
- seek, collect and assess different types of information that concern a project and its management
- work with interaction design and methods for increased user focus
- identify target groups for the development of IT/IS solutions
- identify, analyse and solve legal issues related to information technology

Judgement and approach

To pass the course, the student must demonstrate the ability to

- reflectingly connect theoretical concepts to their own experience of group work
- assess the mutual impact of organisations and their activities and IS
- assess projects and the scope for action of the project management
- assess the role of the designer in interaction-related processes
- choose, assess and explain the choice of representatives for target groups and other stakeholders
- assess the advantages and shortcomings of methods within interaction design

- assess different legal methods employed by society in relation to information technology
- independently document, reflect on and evaluate their own learning process and goal attainment

Course content

The course deals with

- psychological theories and models for understanding communication and group processes in overview
- different roles, areas of responsibility and authorities within an organisation
- the internal processes of organisations with regard to efficiency improvement and IT support
- the structure and context of organisations and the interaction with IT and IS
- the roles of different IT systems in an organisation
- the function and interaction of organisations with other organisations and wider society
- the frames, complexity and prerequisites for projects and project management
- project brief, project definition and establishment
- project management, implementation and evaluation
- project ethics
- methods and assessment criteria for interaction-oriented development
- interface design
- choice of interaction-oriented methods for the development of IS solutions
- human limitations of relevance to interface design
- contract and sales law from an electronic commerce perspective
- electronic contracts, electronic payment, rules about distance contracts and electronic signatures
- intellectual property rights, particularly copyright and patent law in a digital environment
- personal data protection, electronic communication, responsibility for online bulletin boards
- online marketing, issues of international private and procedural law and certain criminal law issues
- simplified methods for problem identification in view of prioritisation, choice and development of mission critical solutions
- a project based on the different subareas of the course addressing the development and change of an IS

Modules

- Group dynamics and communication,
- Organisation, business and IS
- Project management

- Interaction design
- IT law

Course design

The teaching consists of lectures, lessons, seminars, workshops, laboratory exercises, conversation and interview exercises, group exercises and supervision.

Assessment

The assessment is based on written exams, assignments and reports.

Assessed components including documentation and written reflections are compiled in the student's learning portfolio.

Re-examinations are offered in close conjunction with the first examination.

The test and course grades are determined by the course examiner. The examiner is entitled to change the grades given by the teachers on the course if this does not violate Chapter 6, Section 24 of the Higher Education Ordinance (1993:100).

Academic misconduct such as cheating, plagiarism, fabrication and falsification is considered a serious offence in higher education (see Chapter 10 of the Higher Education Ordinance). The disciplinary measures that may be taken as a result of such offences are caution or suspension for a limited period of time from the university (and all the faculties of the university).

Examinations

- Group Dynamics and Communication, Take-Home Exam, 3.0 cr, grading scale: U-A, individual examination
- Organisation, Business and IS, Written Assignment, 3.0 cr, grading scale: U-A, group examination
- Organisation, Business and IS, On-Campus Written Exam, 4.0 cr, grading scale: U-A, individual examination
- Project Management, On-Campus Written Exam, 4.0 cr, grading scale: U-A, individual examination
- Project Management, Written Group Assignments, 3.0 cr, grading scale: U-A, group examination
- Interaction Design, On-Campus Written Exam, 3.0 cr, grading scale: U-A, individual examination
- Interaction Design, Written Assignment, 3.0 cr, grading scale: U-A, group examination
- IT Legislation, On-Campus Written Exam, 4.0 cr, grading scale: U-A, individual examination
- Information Systems Project, Written Assignment, 2.0 cr, grading scale: U-A, group examination
- Learning Portfolio, Written Assignment, 1.0 cr, grading scale: U-G, individual examination

The examiner, in consultation with Disability Support Services, may deviate from the regular form of examination in order to provide a permanently disabled student with a form of examination equivalent to that of a student without a disability.

Grades

Grading scale includes the grades: U=Fail, E=Sufficient, D=Satisfactory, C=Good, B=Very Good, A=Excellent

Grade (Definition) Points or percentage out of maximum points. Characteristic.

A (Excellent) 85-100. A distinguished result that is excellent with regard to theoretical depth, practical relevance, analytical ability and independent thought.

B (Very good) 75-84. A very good result with regard to theoretical depth, practical relevance, analytical ability and independent thought.

C (Good) 65-74. The result is of a good standard with regard to theoretical depth, practical relevance, analytical ability and independent thought and lives up to expectations.

D (Satisfactory) 55-64. The result is of a satisfactory standard with regard to theoretical depth, practical relevance, analytical ability and independent thought.

E (Sufficient) 50-54. The result satisfies the minimum requirements with regard to theoretical depth, practical relevance, analytical ability and independent thought, but not more.

U (Fail) 0-49. The result does not meet the minimum requirements with regard to theoretical depth, practical relevance, analytical ability and independent thought.

To pass the course, the students must have been awarded the grade of E or higher.

Grading rules and definitions

Examination grades

Examinations are graded according to the grading scale U-A or the grading scale U-G (Fail-Pass).

Course grade

A passing grade on all examinations is required to pass the course.

- 1. For each examination with the grading scale U-A, the obtained points are multiplied by the number of credits for the examination. Grades without points are converted as follows: A = 92, B = 80, C = 70, D = 60, E = 52.
- 2. The products of the included examinations are summed up and divided by the total number of credits of the included examinations.
- 3. This results in a weighted average which determines the course grade. 85–100 gives the grade A, 75-84 gives the grade B, 65-74 gives the grade C, 55–64 gives the grade D, 50–54 gives the grade E.

Examinations with the grading scale U-G are not included in the calculation of the course grade.

Entry requirements

Admission to the course requires general requirements as well as the course: "Informatics: Introduction to Information Systems, 1-30 credits" or the equivalent.

Further information

SYSA12 is a programme-specific course and only students on the Bachelor's Programme in Design of Information Systems are admitted.

It is compulsory to attend the introduction meeting, where a roll call will be taken. Absence without notification means that the admitted student will lose their seat on the course.

For transitional provisions with regard to previous courses, please contact the study adviser for an individual assessment.

If the course is discontinued, there may be limited opportunities for re-examination. Please contact the study adviser for information.