

Ethics of Artificial Intelligence

Den artificiella intelligensens etik 7.5 credits

Single subject course

721G28

Valid from: 2023 Autumn semester

| Determined by | Main field of study | |
|---|---------------------------------|----------------------------|
| Course and Programme Syllabus Board at the Faculty of Arts and Sciences | Applied Ethics | |
| Date determined | Course level | Progressive specialisation |
| 2019-03-06 | First cycle | G1N |
| Revised by | Disciplinary domain | |
| Course and Programme Syllabus Board at the Faculty of Arts and Sciences | Humanities | |
| Revision date | Subject group | |
| 2022-12-06 | Other Interdisciplinary Studies | |
| Offered first time | Offered for the last time | |
| Autumn semester 2019 | | |
| Department | Replaced by | |
| Institutionen för kultur och samhälle | | |

Entry requirements

General entry requirements for undergraduate studies English corresponding to the level of English in Swedish upper secondary education (Engelska 6) Exemption from Swedish

Intended learning outcomes

Having completed course, the student should at a basic level be able to:

- provide an account for concepts, theories and problem within applied ethics and the ethics of artificial intelligence (AI),
- develop a theoretically informed argumentation in specific problem areas related to AI.
- formulate theory-based political recommendations and assessments regarding a moral issue related to AI in a particular professional area,
- express an open and critical stance to claims and arguments.

Course content

The course deals with ethical questions that rise from the development of more and more sophisticated autonomous systems, questions of what requirements that should hold for the technology and why included, which sort of agents artificial systems are, if these can be considered moral agents and if they can be ascribed moral responsibility as well as where the main responsibility for artificial intelligence (AI) ought to be placed and why. The course focuses three main areas of moral relevance for autonomous systems and AI: responsibility for decisions made by artificial agents, bias/discrimination as a result of AI use and the importance of participation in the development of AI systems. During this course, students are provided theoretical tools for reflection on the development of AI, requirements that ought to made regarding this technology and how it ought to be managed in society.

Teaching and working methods

The course is based in lectures, group discussions, seminars as well as independent work in the form of preparatory assignments and literature studies. The course is taught both as a campus course and as an internet-based distance course. In the internet-based version, students conduct group discussions on the same questions as students participating in campus-based seminars. The language of instruction is English.

The course utilizes digital interactive teaching methods and applications which can include video clips, notes, quiz and self-tests.



Examination

The course is examined by active participation in seminars and an individually written paper. Detailed information can be found in the study guide.

For a final grade of Pass (E), grades of at least Pass (E) are required for all elements. A higher grade will be based on the individual written examination.

If special circumstances prevail, and if it is possible with consideration of the nature of the compulsory component, the examiner may decide to replace the compulsory component with another equivalent component.

If the LiU coordinator for students with disabilities has granted a student the right to an adapted examination for a written examination in an examination hall, the student has the right to it.

If the coordinator has recommended for the student an adapted examination or alternative form of examination, the examiner may grant this if the examiner assesses that it is possible, based on consideration of the course objectives.

An examiner may also decide that an adapted examination or alternative form of examination if the examiner assessed that special circumstances prevail, and the examiner assesses that it is possible while maintaining the objectives of the course.

Students failing an exam covering either the entire course or part of the course twice are entitled to have a new examiner appointed for the reexamination.

Students who have passed an examination may not retake it in order to improve their grades.

Grades

ECTS, EC



Other information

Planning and implementation of a course must take its starting point in the wording of the syllabus. The course evaluation included in each course must therefore take up the question how well the course agrees with the syllabus.

The course is conducted in such a way that there are equal opportunities with regard to sex, transgender identity or expression, ethnicity, religion or other belief, disability, sexual orientation and age.

If special circumstances prevail, the vice-chancellor may in a special decision specify the preconditions for temporary deviations from this course syllabus, and delegate the right to take such decisions.

About teaching and examination language

The teaching language is presented in the Overview tab for each course. The examination language relates to the teaching language as follows:

- If teaching language is "Swedish", the course as a whole could be given in Swedish, or partly, or as a whole, in English. Examination language is Swedish, but parts of the examination can be in English.
- If teaching language is "English", the course as a whole is taught in English. Examination language is English.
- If teaching language is "Swedish/English", the course as a whole will be taught in English if students without prior knowledge of the Swedish language participate. Examination language is Swedish or English depending on teaching language.

