FHN3014 Medical Technology 3.0 credits

Medicinsk teknologi

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

Establishment

Course syllabus for FHN3014 valid from Spring 2020

Grading scale

P, F

Education cycle

Third cycle

Specific prerequisites

Accepted for doctoral studies at KTH or KI (and from other universities after consultation with the course director).

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 the student with skills to:

- describe the different relationships between technology and health
- critically analyze the strengths and weaknesses of theories and methodologies presently applied to the field of technology and health
- compare methodological approaches in the field technology and health and draw conclusions about their relevance and applicability to his/her own doctoral studies
- reflect on what the concept of sustainable development can mean in their own PhD project, as well as in the field of technology and health based on social, economic and ecological aspect

Course contents

Research leaders join forces to present and explain the theoretical and methodological basis for their discipline using one or several important pieces of work in the field as examples. The workshop discusses strengths and weaknesses of the approach and considers applications in varying areas. The areas covered in the workshops are:

- Humans and technology in interaction
- Images in medicine
- Human tolerance, extreme physiology
- Delivery of care
- Making innovations work
- Safe medical devices
- Sustainability in technology & health

Examination

- INL1 - Hand in assignment, 1.5 credits, grading scale: P, F
- PRO1 - Project, 1.5 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.

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

1. Active participation in the three chosen workshops
2. A written assignment related to each of the seminars, plus preparation tasks and review of provided literature

Other requirements for final grade

Fulfilled requirements as given above.

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.