DM2601 Media Technology and Interaction Design 7.5 credits

Medieteknik och interaktionsdesign

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

Establishment

Course syllabus for DM2601 valid from Autumn 2017

Grading scale

P, F

Education cycle

Second cycle

Main field of study

Computer Science and Engineering

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 introduces methods for human computer interaction with a focus on the area of media technology. Based on issues around interaction with contemporary and future media, the students carry out, during the course, a design project where they gradually go from idea to functional prototype. In each step, they learn about, and apply recognized methods for typical activities in the step e g idea generation, selection and evaluation, as well as various types of sketch and prototype methods.

On completion of the course, the student should be able to:

- use methods for design of interactive media technology in the different phases of the design process
- discuss how different methods can contribute to successful solutions based on research and experiences in the industry
- demonstrate ability to analyse strengths, weaknesses and applicability of different methods
- demonstrate ability to understand and exploit technological properties in the material design to create successful solutions
- demonstrate ability to apply methods for the design of interactive media technologies practically
- demonstrate ability to use modern soft- and hardware tools for human computer interaction

Course contents

A row of lectures and seminars that introduce different design methods combined with design exercises that give practical experience. All exercises is carried out within the frame of the project work that the students carry out during the course. Methods that are brought up include:

- methods to explore a design space: studies of existing interaction modalities, exploration of technologies as design material, state of the art analyses, mood boards
- methods to support design reviews: interaction criticism, parallel design, personas, structured brainstorming.
- methods to develop design alternative: scenario, lo-fi prototypes, video prototypes, prototype construction with modern soft- and hardware tools.
- methods for composition and presentation: fine adjustment and testing of solutions, efficient user tests, presentation of completed solutions online with help by different media.

Course literature

About Face: The Essentials of Interaction Design, 4th Edition Alan Cooper, Robert Reimann, David Cronin, Christopher Noessel
ISBN: 978-1-118-76657-6

As well as research articles and online materials from for example www.interaction-design.org

Examination

- INL1 - Written assignment, self-reflection, 2.5 credits, grading scale: P, F
- PRO1 - Interaction design project within mediatechnology, 5.0 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.

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.