

# **COURSE SYLLABUS**

# Användbarhet och interaktionsdesign

# Usability and Interaction Design

# 7,5 ECTS credit points (7,5 högskolepoäng)

Course code: DV1557
Educational level: First cycle
Course level: G1F
Field of education: Technology
Subject group: Computer Technology

Subject area: Computer Science Version: 7 Applies from: 2015-09-01 Approved: 2015-09-17

#### 1 Course title and credit points

The course is titled Usability and Interaction Design/Användbarhet och interaktionsdesign and awards 7,5 ECTS credits. One credit point (högskolepoäng) corresponds to one credit point in the European Credit Transfer System (ECTS).

#### 2 Decision and approval

This course is established by 2015-09-01. The course syllabus was revised by Head of Department of Creative Technologies and applies from 2015-09-01. The course is replaced with DV1467, Användbarhet och interaktion. Dnr: BTH-4.1.1-0462-2015

#### 3 Objectives

The aim of the course is to provide students with knowledge of the design of interaction systems to improve usability and support the user's needs. The course focuses on methods and concepts for the assessment of usability and interaction design. Furthermore, the course provides an introduction to the field of HCI (human-computer-interaction) and different development methods.

#### 4 Content

- The mental models of users (cognition, learning etc)
- Methods for needs analysis (e.g. GOMS, HTA, AT, heuristic evaluation)
- Principles for interaction design of graphic user interfaces and evaluation of usability
- Development methods

#### 5 Aims and learning outcomes Knowledge and understanding

- account for basic concepts within usability and interaction design
- •account for different development methods used in design and usability tests

#### Competence and skills

• conduct a project aiming to understand and

highlight the needs of users

- design and evaluate different types of user interface
- •justify and apply usability principles for different types of user interface

### Judgement and approach

•understand and communicate (in speech and writing) usability and interaction design

#### 6 Learning and teaching

The teaching consists of lectures and seminars providing the students with the theoretical foundations. Furthermore, the students complete a project in groups evaluating the usability of an existing interactive system. The theoretical component is to be accounted for individually in a written exam and the project is to be presented in groups in a written report, Instructions for lectures, reading and assignments are available in the learning management system at BTH.

Swedish but teaching in English may occur.

# 7 Assessment and grading Examination of the course

Code Module	Credit	Grade
1605 Written	 4 ECTS	A-F
1615 Project	3.5 ECTS	G-U

The course will be graded A Excellent, B Very good, C Good, D Satisfactory, E Sufficient, FX Fail, supplementation required, F Fail.Component 1605 (Written Examination) determines the final grade for the course which is set at first when all components have been completed.

#### 8 Course evaluation

The course coordinator is responsible for systematically gathering feedback from the students in course evaluations and making sure that the results of these feed back into the development of the course.

### 9 Prerequisites

7.5hp completed course in the subject area computer science

## 10 Field of education and subject area

The course is part of the field of education and is included in the subject area Computer Science.

## 11 Restrictions regarding degree

The course cannot form part of a degree with another course, the content of which completely or partly corresponds with the contents of this course.

## 12 Course literature and other teaching material