

### **Blekinge Institute of Technology**

Department of Computer Science

Revision: 6

Reg.no: BTH-4.1.14-0178-2019

## **COURSE SYLLABUS**

# Webbteknologier

### Web Technology

7.5 credits (7,5 högskolepoäng)

Course code: PA1439

Main field of study: Software Engineering, Computer

Science

**Disciplinary domain:** Technology **Education level:** First cycle

**Specialization:** GIN - First cycle, has only upper-secondary level entry requirements

Subject area: Computer Technology Language of instruction: Swedish

**Applies from:** 2019-09-02 **Approved:** 2019-03-01

#### I. Decision

This course is established by 2015-06-04. The course syllabus is approved by Head of Department of Computer Science 2019-03-01 and applies from 2019-09-02.

#### 2. Entry requirements

General requirements for university studies.

#### 3. Objective and content

#### 3.1 Objective

HTML, XHTML and CSS provides services vital to how a web application can be built. With the help of PHP and server-side programming to web application can be more dynamic and managing the storage of information in databases. With PHP, web application built to a more programming-rate structure. A structure that facilitates the development and maintenance.

This introductory course is for those who want to learn techniques from scratch. The course requires no prior knowledge. The course focuses on building blocks of HTML and CSS. We use HTML5 and look in the the opportunities that CSS3 will offer. PHP is introduced as a scripting language and using simple programming constructs created a web application in a structured way. Information stored in a file-based database. The course will use both XML and SQL database SQLite to store information. Simple SQL queries used for querying the database.

Overall, the course is a thorough introduction and orientation of the techniques often used to create Web applications. This course can usefully be taken of those who have no knowledge of either programming or HTML / CSS skills. Course exercises will take into account students' prior knowledge. For those with experience, the course give the opportunity to deep dive in reference guide for HTML and CSS.

#### 3.2 Content

The course includes the following elements:

- HTML, XHTML and HTML5. Validation Tools. @@ Style Sheets. CSS and next generation of CSS3. Validation Tools.
- Script based PHP programming to divide the structure in files and functions and to handle forms and storage in database.
- XML and store form input data in XML files from PHP.
- SQL and file-based relational database SQLite.
- Structured development of Web applications where the view of structure, order affect how we develop our web application.
- Usage, a lesser extent, of tools and techniques suitable for development of Web applications, such as UNIX/Linux installation on external Web server, ssh, ftp/sftp, using version control tools, Git and GitHub.

#### 4. Learning outcomes

The following learning outcomes are examined in the course:

### 5. Learning activities

#### 6. Assessment and grading

Modes of examinations of the course

Code	Module	Credits	Grade	
1610	Assignment I	2.5 credits	GU	
1620	Assignment 2	2.5 credits	GU	
1630	Individual Project	2.5 credits	AF	

The course will be graded A Excellent, B Very good, C Good, D Satisfactory, E Sufficient, FX Fail, supplementation required, F

The course information for each course revision should include the assessment criteria and make explicit in which modes of examination that the learning outcomes are assessed.

#### 7. Course evaluation

The course evaluation should be carried out in line with BTH:s course evaluation template and proces

## 8. Restrictions regarding degree

Content of The course can form part of a degree but not together with another course the content of which completely or partly corresponds with the contents of this course.

#### 9. Course literature and other materials of instruction

#### 10. Additional information

Replaces DV1462...