



Faculty of Health, Science and Technology
Computer Science

Syllabus

Project in Machine Learning

Course Code:	DVAD92
Course Title:	Project in Machine Learning <i>Projekt inom maskininlärning</i>
Credits:	4.5
Degree Level:	Master's level
Progressive Specialisation:	Second cycle, has second-cycle course/s as entry requirements (A1F)

Major Field of Study:
DVA (Computer Science)

Course Approval

The syllabus was approved by the Faculty of Health, Science and Technology 2021-08-31, and is valid from the Spring semester 2022 at Karlstad University.

Prerequisites

English 6 and 60 ECTS credits in Computer Science, including Introduction to Machine Learning (3 ECTS credits), or equivalent

Learning Outcomes

Upon completion of the course, students should be able to:

- use basic theories and methods of supervised, unsupervised, or augmented machine learning to solve problems related to classification, pattern recognition, or decision-making,
- evaluate the suitability of different machine learning methods for given applications,
- use common machine learning tools in practical applications, and
- explain and critically evaluate the results of such applications, orally and in writing.

Content

This is a continuation course in machine learning which aims to impart in-depth theoretical

and practical knowledge of supervised, unsupervised, and augmented machine learning. The course provides students with opportunities to evaluate the suitability of various machine learning methods for given applications, and use common machine learning tools in practice.

Reading List

See separate document.

Examination

Assessment is based on individual project reports and an oral presentation.

If students have a decision from Karlstad University entitling them to Targeted Study Support due to a documented disability, the examiner has the right to give such students an adapted examination or to examine them in a different manner.

Grades

One of the grades 5 (Pass with Distinction), 4 (Pass with Some Distinction), 3 (Pass), and U (Fail) is awarded in the examination of the course.

Quality Assurance

Follow-up relating to learning conditions and goal-fulfilment takes place both during and upon completion of the course in order to ensure continuous improvement. Course evaluation is partly based on student views and experiences obtained in accordance with current regulations and partly on other data and documentation. Students will be informed of the result of the evaluation and of any measures to be taken.

Course Certificate

A course certificate will be provided upon request.

Additional information

The course DVAD92 cannot be included in the same degree programme as the course DVGC27.

The local regulations for studies at the Bachelor and Master levels at Karlstad University stipulate the obligations and rights of students and staff.