



MG1010 Introductory Welding Technology, General Course 6.0 credits

Svetsteknologi, allmän kurs

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

Establishment

Course syllabus for MG1010 valid from Autumn 2015

Grading scale

A, B, C, D, E, FX, F

Education cycle

First cycle

Main field of study

Mechanical Engineering, Technology

Specific prerequisites

Basic eligibility and 120 cr in Engineering

Language of instruction

The language of instruction is specified in the course offering information in the course catalogue.

Intended learning outcomes

After passing the course, the student will be able to:

- describe fundamentals in materials technology of welding
- outline the fundamentals in processing of welding
- describe fundamentals in strength of materials in welded constructions
- evaluate breakdown safety in a construction during normal operation
- choose material and process to give structural strength.

Course contents

A survey of problems in welding technology with a focus on weldability of steel and welding methods.

Disposition

The classes are concentrated to two full days of studies, in average every second week. In between classes homework assignments and preparation work have to be completed. High degree of attendance to classes is required. The course includes laboratory exercises in welding and cutting methods.

Course literature

Kompendierna:

"Svetsningens materialteknologi" av NilsErik Hannerz

"Svetsteknologiskt ABC" av Kjell Eriksson

"Vanliga svetsmetoder" av Klas Weman

Examination

- SEM1 - Seminar, 0.0 credits, grading scale: P, F
- TEN1 - Examination, 6.0 credits, grading scale: A, B, C, D, E, FX, F
- LAB1 - Laboratory Work, 0.0 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.

Other requirements for final grade

Approved laboratory exercises (LAB1; 0,0 cr)

Active participation in seminars (SEM1 0,0 cr)

Passed written examination (TEN1; 6,0 cr)

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.