SF2721 Topology 7.5 credits

Topologi

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

If the course is discontinued, students may request to be examined during the following two academic years

Establishment

Course syllabus for SF2721 valid from Autumn 2008

Grading scale

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

Education cycle

Second cycle

Main field of study

Mathematics

Specific prerequisites

Language of instruction

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

Intended learning outcomes

To provide an introduction to the basic parts of geometric topology.

Course contents

General topology, compact and connected spaces, quotient spaces. Fundamental group, homotopy, triangulation, singular homology theory, Euler characteristic. Classification of closed surfaces, Jordan's curve theorem. Introduction to fixed point theory: theorems of Brouwer and Borsuk-Ulam.

Course literature

To be announced at course start. Last time Armstrong: Basic Topology, Springer, 1983, was used.

Examination

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.

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.