



SLUkurs

Syllabus

PNSo218 Advanced Inorganic Chemistry, 15.0 credits

Syllabus approved

2021-03-04

Subjects

Chemistry

Education cycle

Third cycle

Grading scale

Pass / Failed

The requirements for attaining different grades are described in the course assessment criteria which are contained in a supplement to the course syllabus. Current information on assessment criteria shall be made available at the start of the course.

Language

English

Prior knowledge

Master degree in Chemistry or Materials Science

Objective, including learning outcomes

After completing the course the student shall be able to

- Discuss principal models for the electronic structure and bonding of atoms, molecules and bulk solids.

- Discuss and argue for application of different characterization methods for revealing the structure and bonding.
- Discuss principal approaches to, fundamental features of structure and chemistry, and applications of elements in the groups of Periodic Table and their most important compounds.

Content

The course will provide insights into most important theoretical principles in understanding the structure and reactivity of inorganic compounds. It will be organized as a series of workshops, where the students will discuss bonding models, spectroscopic characterization, and, most importantly, chemical properties of the elements through the whole Periodic Table.

Requirements for examination

Written exam

Additional information

PhD-students and postdocs from SLU and other Swedish Universities are welcome to register for this course, although the SLU PhD-students will be given priority.

Responsible department

Department of Molecular Sciences