



LUNDS UNIVERSITET
Lunds Tekniska Högskola

Course syllabus

Samhällsplanering Risk Based Land Use Planning

VRSN30, 7,5 credits, A (Second Cycle)

Valid for: 2023/24

Faculty: Faculty of Engineering, LTH

Decided by: PLED BI/RH

Date of Decision: 2023-04-12

General Information

Compulsory for: BI3

Elective for: RH4, R4, BR4

Language of instruction: The course will be given in English on demand

Aim

The course will provide the student with sufficient knowledge to allow him/her to participate at early stages in the land use planning process in such way that risk assessments can be integrated and used to create a basis at a strategic stage of the planning process, with the objective of achieving a resilient society.

Learning outcomes

Knowledge and understanding

For a passing grade the student must

- show a general understanding of the planning process and being familiar with some of the most central concepts related to land use planning.
- show an understanding of what types of risks being relevant to take into consideration at different levels of land use planning.
- show an understanding for what actors and interests that are involved in the planning process, and how they interact with questions relating to risk management.

Competences and skills

For a passing grade the student must

- be able to identify and analyse those risks and vulnerable objects that exist in the studied geographical area and be able to develop input to a plan proposal in such way that

existing preconditions are taken into consideration.

- be able to suggest and argue for well-considered measures that in a planning context contribute to a resilient society.
- be able to present and discuss relevant risk-related questions in land use planning, verbally as well as in writing, with interested stakeholders.
- be able to search for, and assess information with a high degree of independence and to assume responsibility that the group work carried out is completed and reported on within given time-frames.

Judgement and approach

For a passing grade the student must

- demonstrate a capacity to assess and relate to trade-offs between risk-related questions and other interests in land use planning.
- demonstrate a capacity to assess what type and level of detail of risk-related questions that are most relevant to handle in different planning processes.
- demonstrate a capacity to reflect on the future professional role relating to risk based land use planning.

Contents

The course elaborates on the nature and scope of land use planning instruments. The course also includes modules that provide the student with understanding of different interests that are normally considered in the land use planning process, and their potential conflicts and synergies. Moreover, the course develops the student's conceptual understanding of the concept of vulnerability and its connection to related concepts. Through guest lectures, the course gives the student an understanding of practical opportunities and challenges in working with risk reduction in land use planning, from the perspective of a number of professional roles. Finally, the course provides the student with a basic understanding of the expected impacts of climate change and opportunities in land use planning to mitigate risks related to climate change, including knowledge of strategies for treatment of uncertainty. In addition to lectures and seminars, the course includes both individual assignments and group assignments.

Examination details

Grading scale: UG - (U,G) - (Fail, Pass)

Assessment: Examination is carried out individually through submission of preparatory assignments and an oral examination, and in group through oral examination and written report of the project assignments and critical review of another project assignment.

The examiner, in consultation with Disability Support Services, may deviate from the regular form of examination in order to provide a permanently disabled student with a form of examination equivalent to that of a student without a disability.

Parts

Code: 0120. **Name:** Oral Examination.

Credits: 3. **Grading scale:** UG. **Assessment:** Passed oral examination.

Code: 0220. **Name:** Individual Assignment.

Credits: 1. **Grading scale:** UG. **Assessment:** Passed individual assignment **Contents:** Written assignments.

Code: 0320. **Name:** Group Assignment.

Credits: 3,5. **Grading scale:** UG. **Assessment:** Passed project assignment **Contents:** Written assignments, oral presentation and external reviewing of other students assignments.

Admission

Assumed prior knowledge: Basic course in risk assessment with a minimum of 7,5 credits, e.g. VRSN05 Foundations for Risk Assessment and Management, VBRN45 Risk Assessment in Fire Protection Engineering, VRSN25 Risk Assessment in the Safety Area or VBR180 Risk Analysis Methods.

The number of participants is limited to: 60

Selection: Completed university credits within the program. Within programs where the course is given as a compulsory course students are guaranteed admission. Thereafter priority is given to students enrolled in programs that include the course in the curriculum.

The course overlaps following course/s: VBR110, VRSN20, EXTP70

Reading list

- Cedergren, A., & Hassel, H. : A Risk Assessment Framework for Land Use Planning. Lund University: Lund, 2018.
- Hallegatte, S. : Strategies to adapt to an uncertain climate change. 2009. *Global Environmental Change*, 19, 240–247.
- Wamsler, C. : *Cities, Disaster Risk and Adaptation*. Routledge: New York, 2014.
- Wisner, B., Blaikie, P., Cannon, T., & Davies, I. : *At risk: natural hazards, people's vulnerability and disasters – Second edition*. Routledge: New York, 2003.
- Bankoff, G.; Frey, G. and Hilhorst, D. (eds) : *Mapping Vulnerability. Disasters, Development & People*. Earthscan, 2004.
- PBL Så planeras Sverige. Boverket, 2018. Utdrag från PBL kunskapsbanken (<http://www.boverket.se/sv/PBL-kunskapsbanken/planering/>).
- Coppola, D. P: *Introduction to international disaster management*, (2 ed). Oxford: Butterworth-Heinemann (Elsevier), 2011.
- Länsstyrelsen i Skåne län : *Riktlinjer för riskhänsyn i samhällsplaneringen – Bebyggelseplanering intill väg och järnväg med transport av farligt gods*. Rapport 2007:06. Länsstyrelsen i Skåne län: Malmö., 2007.
- *Klimatanpassning i fysisk planering – Vägledning från länsstyrelserna*. Länsstyrelserna, 2012.
- Wikman Svahn, P. : *Principer för robusta beslut inför osäkra klimatförändringar*,. Skolan för arkitektur och samhällsbyggnad, KTH: Stockholm., 2016.
- MSB: *Olycksrisker och MKB: Att integrera risk- och säkerhetsfrågor i MKB-processen*. Myndigheten för samhällsskydd och beredskap: Karlstad, 2012.
- Kuran, C.H.A., et al: *Vulnerability and vulnerable groups from an intersectionality perspective*. *International Journal of Disaster Risk Reduction* (50), 1-8, 2020.
- Shaw, R., Colley, M., & Connell, R.: *Climate change adaptation by design: a guide for sustainable communities*. London, 2007.

Contact and other information

Course coordinator: Alexander Cedergren, alexander.cedergren@risk.lth.se

Course administrator: Linnéa Ekman, linnea.ekman@ebd.lth.se

Further information: Active participation in group work is mandatory. Each group member must be able to present and answer for the contents of the joint report. A student who does not meet the demands of active participation, or disregard their obligations, can

be replaced to another group or failed by the examiner.