

COURSE SYLLABUS

Research Methods for the Built Environment, 7.5 credits

Research Methods for the Built Environment, 7,5 högskolepoäng

Course Code: TRBS23 Education Cycle: Second-cycle level

Confirmed by: Dean Mar 1, 2023 Disciplinary Technology

Revised by: Director of Education May 17, 2023 domain:

Valid From:Aug 1, 2023Subject group:BY1Version:2Specialised in:A1F

Main field of study: Built Environment

Intended Learning Outcomes (ILO)

After a successful course, the student shall:

Knowledge and understanding

- display knowledge in identifying research problems, its theoretical framing, and the consequences for research design
- display knowledge in selecting appropriate research methods.

Skills and abilities

- demonstrate the ability to prepare a research plan
- demonstrate the ability to experiment with data collection and data treatment of a cohort
- demonstrate the ability to apply assessment methods for interaction between humans and the built environment (products and/or services).

Judgement and approach

- demonstrate the ability to critically review evidence levels for research papers
- demonstrate the ability to compose a research plan
- demonstrate the ability to argue for research design and its consequences.

Contents

The course will provide students with knowledge about the research process within the built environment subject, from formulations research problems to the written production of scientific essays.

The course includes the following elements:

- Introduction to research for the built environment and the research process
- Introduction to human factors in the built environment
- Methodology for investigation of the built environment including quantitative and qualitative assessment methods
- Specific research approaches for the Built Environment including for example Human factors, Evidence Based-Design, Post Occupancy Evaluation, etc.

Type of instruction

The course consists of lectures, exercises, and seminars.

The teaching is conducted in English.

Prerequisites

Passed courses at least 90 credits within the major subject in construction engineering, civil engineering, architecture engineering, lighting design or equivalent and 15 credits in mathematics, and taken course Scientific Introduction to BIM and Sustainability 7,5 credits, or equivalent. Proof of English proficiency is required.

Examination and grades

The course is graded 5,4,3 or Fail.

The final grade for the course is based upon a balanced set of assessments. The final grade will only be issued after satisfactory completion of all assessments.

Registration of examination:

| Name of the Test | Value | Grading |
|------------------|-------------|---------|
| Assignment | 5 credits | 5/4/3/U |
| Examination | 2.5 credits | 5/4/3/U |

Course literature

The literature list for the course will be provided 8 weeks before the course starts. Articles will be provided during the course.