



## Course syllabus

Faculty of Health and Life Sciences

Department of Health and Caring Sciences

4HÄ025 Hälsovetenskapliga forskningsmetoder - fördjupning i kvantitativa metoder, 7,5 högskolepoäng

4HÄ025 Health Science Research Methods - Advanced Quantitative Methods, 7.5 credits

### **Main field of study**

Health Science

### **Subject Group**

Other Interdisciplinary Studies

### **Level of classification**

Second Level

### **Progression**

A1F

### **Date of Ratification**

Approved by Faculty of Health and Life Sciences 2019-04-29

The course syllabus is valid from spring semester 2020

### **Prerequisites**

General entry requirements for second cycle studies and specific requirements:

- 4HÄ020 Health Science Research Methods 7.5 credits
- English 6

or equivalent.

## Objectives

After completing the course the students will be able to:

- describe and compare various quantitative methods in health science
- apply quantitative analysis methods
- apply descriptive and inferential statistics
- describe, evaluate and present quantitative data
- develop arguments based on research ethics
- discuss credibility criteria in quantitative research

## Content

- Quantitative methods and measurement levels
- Descriptive statistics and interval estimation
- Hypothesis testing
- Correlation analyses
- Statistics/Data Analysis with SPSS (Statistical Package for the Social Science)
- Ethical reasoning
- Credibility criteria

## Type of Instruction

- Group work
- Lectures
- Seminars

## Examination

The course is assessed with the grades Fail (U), Pass (G) or Pass with Distinction (VG).

The course examination is an individual written assignment.

Repeated examination is offered in accordance with Local regulations for courses and examination at the first and second-cycle level at Linnaeus University.

If the university has decided that a student is entitled to special pedagogical support due to a disability, the examiner has the right to give a customised exam or to have the student conduct the exam in an alternative way.

## Course Evaluation

During the implementation of the course or in close conjunction with the course, a course evaluation is to be carried out. Results and analysis of the course evaluation are to be promptly presented as feedback to the students who have completed the course. Students who participate during the next course instance receive feedback at the start of the course. The course evaluation is to be carried out anonymously.

## Required Reading and Additional Study Material

Creswell, J. (latest edition). *Research Design: Qualitative, Quantitative, Mixed Methods Approaches*. SAGE. (app. 50 p.).

Grove, S. K. (latest edition). *Statistics for health care research: A practical workbook*. Elsevier Saunders. (app. 341 p.).

Lang, T. A., Secic, M., & Lang, T. (latest edition). *How to report statistics in medicine: annotated guidelines for authors, editors, and reviewers*. ACP Press. (app. 50 p.).

Polit, D. F. & Beck, C. T. (latest edition). *Essentials of Nursing Research. Appraising Evidence for Nursing Practice*. Wolters Kluwer. (app. 50 p.).