

## **Applied Data Analysis (SE-037)** (RAKENDUSLIK ANDMEANALÜÜS)

## SUBJECT DESCRIPTION

Credits (ECTS)	5.00 ECTS
Assessment	grading

## Aim of the subject and short description

The course is based on the fundamentals of data analysis, focusing on programmable data processing and statistical analysis in Python. It is intended for students with prior programming experience and aims to expand their skills by transitioning from spreadsheet-based analysis to scripting and automation. During the course, students will acquire the knowledge and skills needed to work with real-world datasets, perform statistical analyses, and visualize data using relevant libraries such as Pandas, Matplotlib, and Seaborn. The course supports students' ability to apply programming skills in data-driven decision-making and problem-solving.

## Learning outcomes:

Student:

- 1. understands the core concepts of programmable data analysis and statistical modeling;
- 2. uses Python to clean, transform, and analyze large datasets;
- 3. applies exploratory data analysis (EDA) techniques to uncover meaningful insights;
- 4. creates visualizations to interpret data and support decision-making;
- 5. is capable of working with real-world datasets to solve business and technical problems.