



## DK Multivariate Business Statistics (in English)

2 SSSt, 5 ECTS, SS 2020, Course Nr.: 390024

Wednesday 15:00-16:30 s.t., SR 3

Ao. Univ.-Prof. Dr. Heribert Reisinger

### Aims

- Understanding the principles of selected multivariate business statistics techniques
- Realising how to use these techniques in scientific work
- Applying the techniques in a practical data analysis project

**Target Group:** Students of the PhD-Management

**Registration:** Online via u:space

### Organisation

The course consists of three parts. In the **first part**, the theoretical principles of selected multivariate techniques are presented by the instructor. Since not all the material can be covered, careful reading of the relevant chapters in the textbooks is necessary. This part ends with a written examination. In the **second part**, the participants are expected to present a scientific article in which one or more multivariate techniques are used (mid-term presentations). In the **third part**, the participants conduct a practical data analysis project with a given data set. For data analysis, the SPSS package is used.

11.3.	Theory – Introduction
18.3.	Theory – Factor Analysis
25.3.	Theory – Cluster Analysis
1.4.	Theory – Multiple Regression
22.4.	Theory – Logistic Regression
29.4.	Written examination & Introduction data analysis project
13.5.	Mid-term presentation (article)
20.5.	Mid-term presentation (article)
3.6.	Reserve
10.6.	End-term presentation (project)
17.6.	End-term presentation (project)
24.6.	End-term presentation (project)

### Literature

- Hair, J.F.Jr., Babin, B.J., Anderson, R.E., Black, W.C. (2018): Multivariate Data Analysis, 8<sup>th</sup> ed., Cengage (7<sup>th</sup> ed.: Hardcover 2010, Kindle 2013, Paperback 2014)
- Iacobucci, D., Churchill, G.A.Jr., (2018): Marketing Research – Method. Foundations, 12<sup>th</sup> ed., CreateSpace
- [Supplement: Tabachnik, B.G., Fidell, L.S. (2019): Using Multivariate Statistics, 7<sup>th</sup> ed., Pearson]
- [Supplement: Backhaus, K. et al. (2016): Multivariate Analysemethoden, 14. Aufl., Springer]

### Assessment

✓ Written examination	30 Percent
✓ Mid-term presentation (article)	20 Percent
✓ End-term presentation (project)	20 Percent
✓ Course paper	30 Percent

Attendance in all units is a requirement for grading. For a positive grade, at least 50 percent are necessary.