

Announcement WiSe 2017/18

Lecture in Mathematical Finance

Quantitative Risk Management

Prof. Dr. Matthias Scherer

Area: / Modulnr.: Mathematical Finance / MA 5415

Course Structure: Lecture: 2h Exercises: 1h

Content: Basic concepts in Risk Management, Basel II and Solvency II, risk measures: examples and discussions, extreme value theory, multivariate models: dependence modelling, normal and normal mixture models, copulas, simple dimension reduction methods.

Audience: BSc Mathematik, MSc Mathematik, Mathematical Finance and Actuarial Science, OR

Prerequisite: MA1401 (Introduction to Probability Theory), MA2003 (Measure and Integration), MA2402 (Basic Statistics), MA2409 (Probability Theory)

Literature:

McNeil, A.J., Frey, R. and Embrechts, P. (2005): Quantitative Risk Management: Concepts, Techniques and Tools, Princeton University Press.

Carmona, R. (2004): Statistical Analysis of Financial Data in S-Plus, Springer, New York.

Glasserman, P. (2004): Monte Carlo Methods in Financial Engineering, Springer, New York.

Gumbel (1958): Statistic of Extremes.

Certificate: Exam, 5 CP

Location/ Time: see TUMonline