Modelling return dependence in financial markets

The aim of this thesis is to create models of returns of financial assets, traded on financial markets.

Due to the integration of these markets, as well as the dramatic events in the world economy, dependence between returns of distinct assets arises – either within national markets, or between them. These dependencies may be identified in the expected returns, but also in their volatilities, as well as extreme values. The existence of mutual linkages transcends partial financial markets, and thus it is also possible to identify relationships between different asset classes. The fulfillment of the goals set in the thesis assumes the formulation of investment strategies exploiting the identified relationships to strengthen the return, and/or risk profile of an investor.