

Creation of a Reserve Fund as a Tool for Ensuring the Financial Security of an Enterprise*

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Abstract

The paper substantiates the need to study the level of financial security of an enterprise. To study the dynamics of financial security of an enterprise it is considered a system-dynamic model and simulation of distributed financial flows of an industrial enterprise under impact of random factors, which reflect the threats affecting the financial security of enterprise. Information on the financial statements of firms is often confidential, which leads to the need to develop a simulation model of the firm’s activities and to conduct experimental research based on size of an enterprise’s reserve fund, which guarantees its financial security. During simulation experiments for industrial enterprise three scenarios (pessimistic scenario, optimistic scenario and most probable scenario) were considered and it was established that for at least half of the cases, an enterprise needs to form a reserve fund to maintain an autonomous operation and ensure the necessary level of financial security.

Keywords: Financial Security, Financial Stability, Current Assets, Cash Flow, Simulation Model of Enterprise.