

The construction and validation of warning system for investment risks by

MTS

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Abstract

To find the hidden traps in investment market is not easy, so mistaken investment decision always lead to serious financial damage. Studying on investment risk forecasting model will be undertaken in this paper by applying MTS in attempting to construct a stable and predictable system to put precaution on investment risks. Research objects will be companies listed on Taiwan Stock Exchange Corporation (TSEC). Moreover, the selection of these companies shall have complete information on Taiwan Stock Exchange Corporation's (TSEC) data and then these companies will be divided into 2 groups. Group 1 as test group for establishing prediction model, are within information during 2002 to 2004. Group 2 as control group for verifying accuracy of the model, are within data since 2005. Financial indexes will assist to evaluate operation performance of these companies in the past three years. It is to assure the financial forecasting accuracy on normal and abnormal companies. However, MTS is a new approach developed by Taguchi which conducted Mahalanobis Distance into various areas. MTS could be used in forecasting. It is not to discuss current forecasting methodology itself, but to provide an approach that summarized all kinds of existing data and simplifies the process by reducing amount of irrelevant information. This paper will examine the most significant factors of financial crisis in aspect of fundamental analysis, as well as using MTS to establish causal relationship between causes (financial ratios) and effect (financial failures). This study is aim at constructing an operational crisis model which is based on MTS within past three years' operational data. In addition, we will select Taiwan listed companies as samples due to considering the effects once crisis occurred. And these samples do not

include financial related industries.

Keyword : : MTS, Investment Risk Prediction, Financial Crisis