

Effective Credit Scoring with Self-Developed Decision Support

Folkia's business is to provide short-term loans and selecting the correct customers is very important to the company. Therefore, Folkia made the decision to develop a customized credit decision support system.

Folkia was established in Norway in 2006 and is now present in Sweden, Finland, Denmark, and Estonia. The company's main goal is to provide their customers with down-to-earth financial services in an economical and effective way. Their new credit score model has been developed in collaboration with the consulting firm Aregab, and uses *STATISICA* software from StatSoft. *STATISICA* is a powerful data management and analytical tool that can optionally include data miner. The combined power of the analytics and the data mining makes the system very quick, and the software offers a graphic presentation at every step in the process, from selection to test.

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Nickolaus Karlsson, Credit Manager

In the development of the system, several models were built simultaneously using the same data but with different statistical methods. The software supports logistic regression, MARSplines, boosted-trees, and more. Therefore, the different methods were tested against each other in order to see which model worked best.

"Both the data miner and the analytic tools are good separately. But together, they work even better. The stages are simplified and it's extremely effective," says Nickolaus Karlsson, Folkia's credit manager.

The completed score model rates the customers by credit risk and has a very good discrimination capability between good and bad customers. The worst customers can be dropped or treated in another way.

"A low score doesn't mean that we won't do business with them, but we may have to conduct it under different conditions," says Nickolaus.

"A big advantage with our own system is that the maintenance is easy. Everything is kept in the same environment; therefore, we don't have to manually make changes in the program. When we update a score model, we only run the model with the new data. Then we monitor that the system works as it should and put it in production."

"The hardest work when creating a system like this is saving and structuring data. We started saving data on customer behaviour from the start of our business in 2006. The alliance with Aregab began during spring 2009. We started collecting data with the objective of using it for data mining in April, and in June we could start the new system. This investment has led to 'one-stop shopping'. This has made the system very cost-effective and the development of the system has been very quick."

"Except perhaps for the large commercial banks, there isn't anyone within our field using a similar method for scoring. The model that we found had much more predictive power than the standard models found by other methods."

"We reduce the risks of extending credit to customers that will default by approximately 40% by using this new credit decision support system. At the same time, other turnover is only reduced by 3-4 %. That's what is best with our new system," concludes Nickolaus Karlsson.