

## Increasing Debt Collection Effectiveness Using RiskTree

*Fractal helps leading bank in Taiwan design effective Collections strategy using Collections RiskTree*

### SUMMARY

- **Client**  
A leading credit card issuer in Taiwan
- **Challenge**  
To increase dollars collected on portfolio in default while using minimum collections resources
- **Solution**  
Fractals' Collections RiskTree
- **Result**  
Created incremental collection capability of up to USD 4 million through strategic allocation and optimization of collections resources

### ■ The Business challenge

Our client, a leading credit card issuer in Taiwan, was faced with the challenge of collecting outstanding credit card debt from a large number of accounts. Debt collection can be expensive business if the right collection strategies are not utilized. Expansion of collections resources is not necessarily the best solution as it increases costs thus taking away from the incremental dollars collected. At the same time, a random increase in the quantum of collections effort can also be a customer relationship nightmare, especially with customers that normally pay on time and are likely self-cures.

Fractal was able to sense a potential to collect additional outstanding dollars by using an optimal collections strategy and effective dunning schedules. The most important task in designing an effective collections policy is to segment and score accounts by their propensity to self cure, roll-over or charge-off. Once a bank can classify debtors by their propensity to self-cure or roll over the bank can optimally utilize its collections resources to maximize collections.

### ■ The Solution

Fractal deployed its product Collections RiskTree™, to address the problem of suboptimal utilization of collections resources. Collections RiskTree™ uses historical information on debtors' behavior and correlates that to debtors' transaction history, bureau information, card characteristics and demographic data. Behavioral and demographic information is used to segment the portfolio of debtors and predict their behavior in the near future.

We built two separate RiskTree models. The first model was an early stage model which scored customers for their propensity to roll over from early stage delinquency to mid stage delinquency. The second model was used to model the delinquency behavior of customers in a later bucket.

Using advanced statistical techniques, the RiskTree model provided a rule based classification to segment the delinquent customers based on their propensity to roll over into higher delinquency buckets or to self cure (roll-back into earlier delinquency buckets). RiskTree also provided a list of key indicator variables that were used for segmentation and scoring model. RiskTree used customer information variables like maximum past delinquency, credit limit utilization, average pay down ratio, balance outstanding etc to develop the Collections Model.

Based on the models developed by RiskTree, an effective collections strategy was designed clearly identifying the segments which were potential self cures, those which had a high propensity of rolling over to higher delinquency buckets and segments that were most likely to become charge-offs.

## ■ Result

The RiskTree models showed that around 75% of the delinquent customers were likely self cures and the bank could follow a soft collections policy for this segment. A huge savings in cost was attainable by simply reducing the quantum of collections resources expended on this segment. Further, the self-cure segment would also grow in loyalty since the bank would not need to bother them with collections calls.

The model also indicated that bulk of the charge-off risk was concentrated within 25% of the accounts. Redirecting resources to this 25% of the population which constituted majority of the dollar risk would ensure higher dollar collections without increasing the cost of collection. Our preliminary return on investment models indicated that the bank could potentially collect an additional USD 4 million by simply reallocating collections resources as indicated by RiskTree.

## ➤ About Fractal

*Fractal is a leading provider of customer analytics to consumer banks, credit card issuers, CPG companies and telecom companies. Fractal's analytical solutions have helped companies across the globe enhance profitability by powering their customer management efforts with scientific decision making.*



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