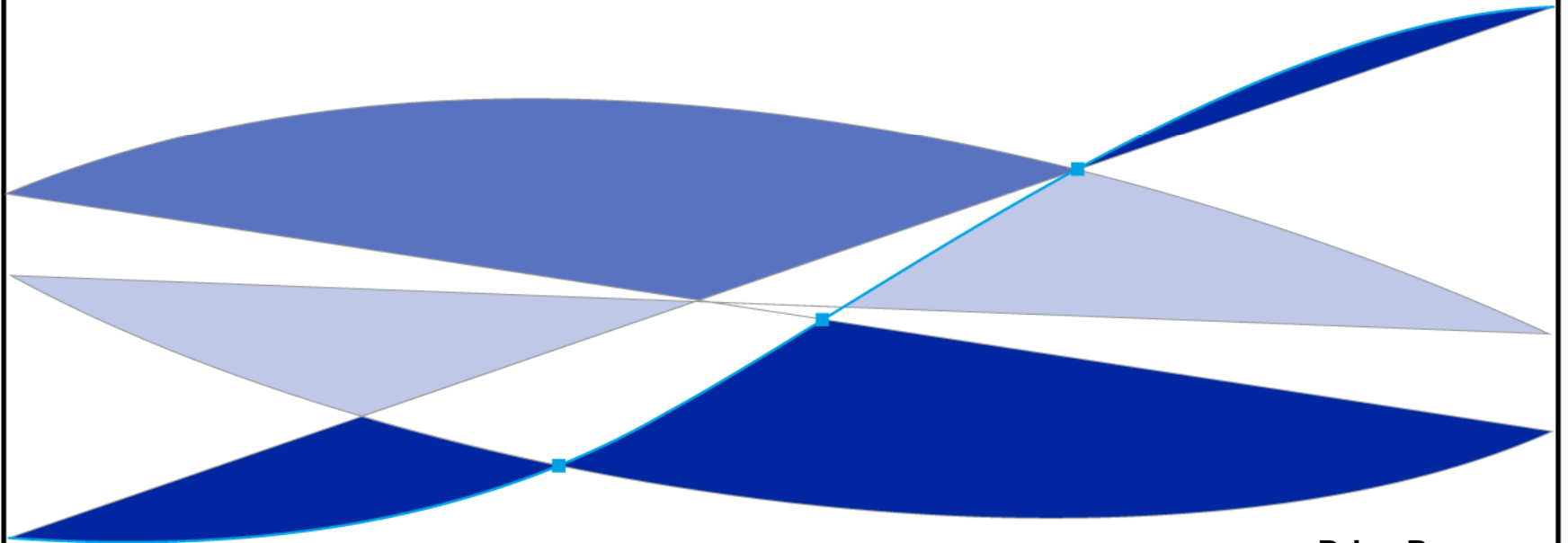


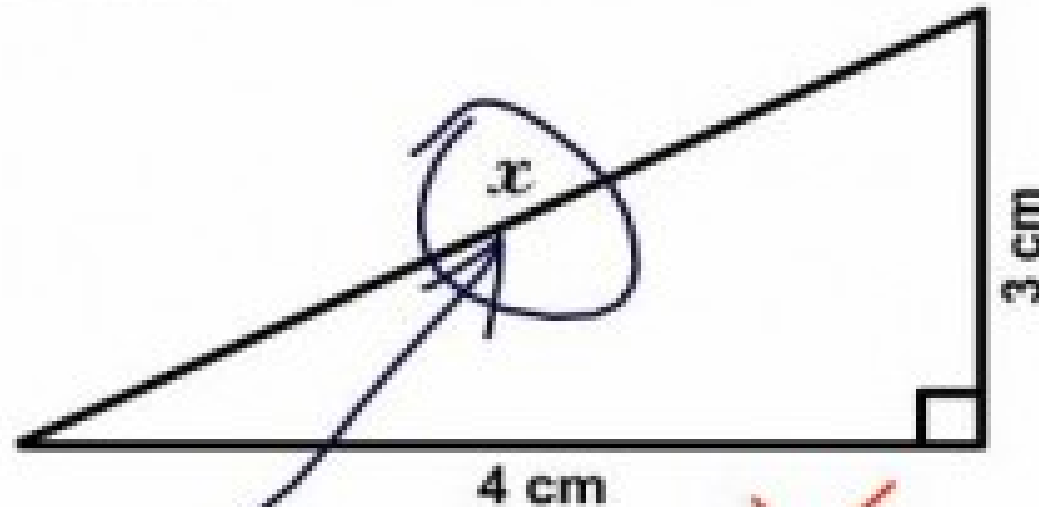
Retail Credit Risk: The Future of Corporate Credit Risk?



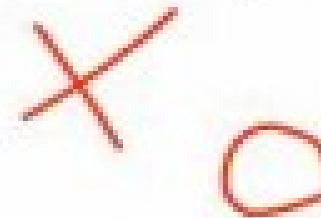
Brian Ranson
Managing Director, Credit Strategies
Brian.Ranson@mkmv.com

Question 3. Find 'X'

3. Find x .



Here it is



The Common View



“Prediction is very difficult, especially about the future”

Niels Bohr

The Perils of Forecasting

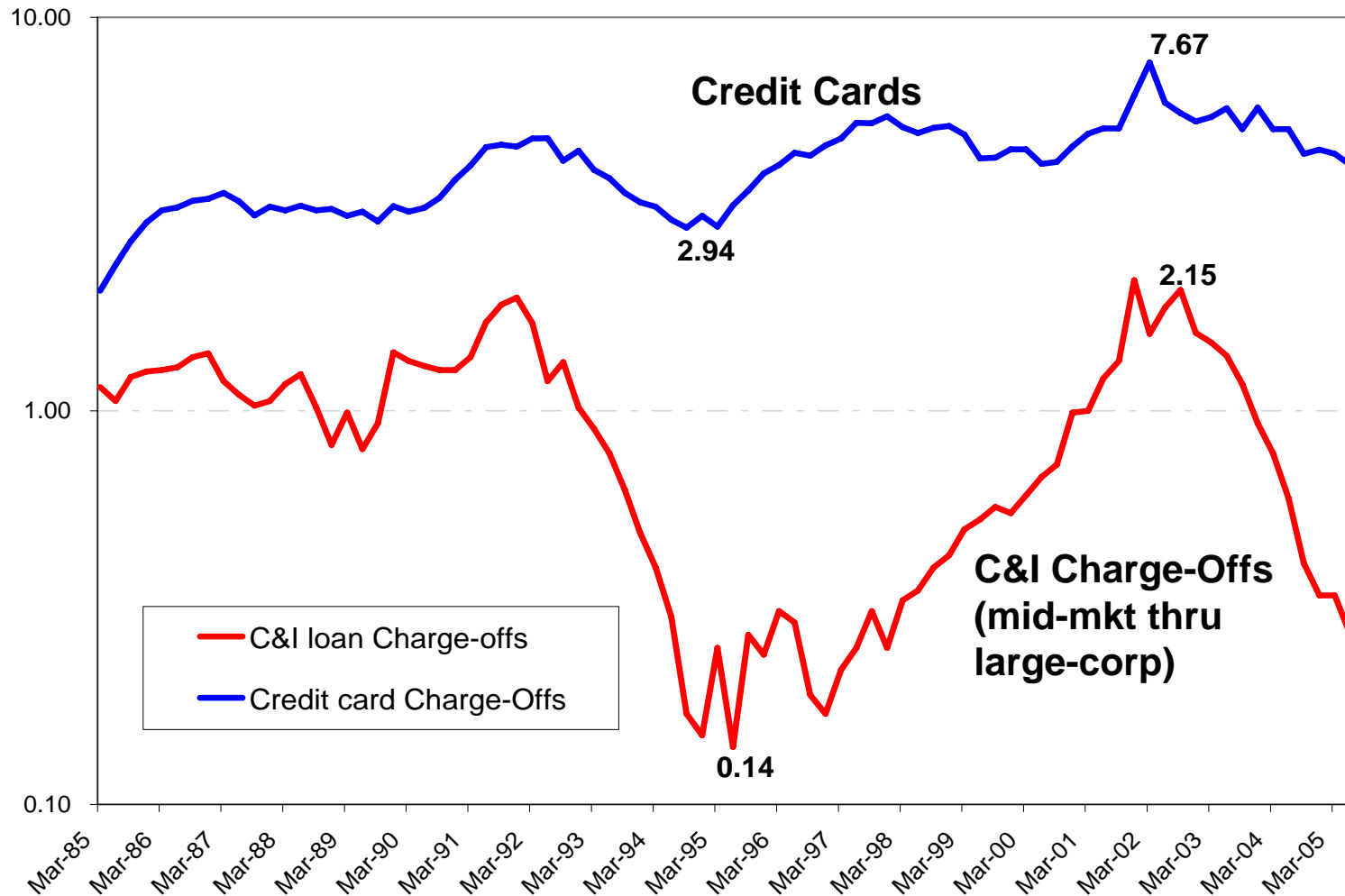


“An economic forecast is like a one-eyed javelin thrower...not very accurate but likely to have the full attention of the audience”

What Makes Retail Banking Successful?

1. Hugely diversified, low volatility portfolios
2. Disciplined, consistent pricing and margins
3. Solid understanding of LGD based on decades of data
4. Tested and validated risk scoring system
5. Generally good databases and accounting processes
6. Trust in models, measures and statistics
7. Competition has spurred innovation and acceptance of technology
8. Lack of power/influence allowed technological methods to advance
9. No relationship with clients except at very low organizational level
10. Consistency of assets/documentation allows securitization/capital management

Consumer & Commercial Portfolio Behavior: Charge-Offs



The Contrast with Corporate/Business Banking

1. Hugely diversified portfolios

Corporate banking is plagued by concentrations either through geography, demand patterns, optimism or sheer incompetence.

2. Disciplined and consistent pricing

CB spreads are more cyclical than risk sensitive and often unlinked to structure. CB often complain of “competitive necessity” to sell at a loss.

3. Solid understanding of LGD based on long data history

CB has generally been dreadful at maintaining historic data (indeed even current non-accounting data) but meaningful changes are in progress.

4. Tested and validated scoring system

Tremendous resistance to the transfer of primary risk assessment to models from individual or committee judgment.

The Contrast with Corporate Banking

5. Generally good databases and accounting

Generally no databases and bad management accounting (e.g. loan losses, loan values, risk rating migration etc). Permits the use of accumulated wisdom/experience in a policy framework adjudicated by experts.

Accumulated Wisdom (Lore)



**“Never lend to
anything that
uses
tablecloths”**

But, in recent years, restaurants were not the riskiest small business

Highest defaults were...



And the lowest were...



Accumulated Wisdom (as reported by Dr. Altman)

No show business people

No taxi drivers



Robert De Niro fails on both counts (perhaps wisely)

The Contrast with Corporate Banking

6. Trust in models and statistics

Generally little or no trust (partly because of a lack of data, statistics and validation). Repeated belief in 'art' as well as science

7. Competition spurs innovation, technology, rapid change

Competition spurs bad pricing, looser structures, poor decisions

The Contrast with Corporate Banking

8. Lack of power of managers allowed technology-induced obsolescence
Powerful, entrenched, highly paid, well educated, relationship devotees
9. No relationship with clients except at very low levels within the organization
Clients often more important than shareholders.
10. Consistency of assets allows for securitization, capital management
Poor pricing, poor databases, range of documentation, limited understanding of LGD dynamics restrains securitization, liquidity and flexibility

How Can Corporate Banking Gain the Advantages/Stability of Retail Banking?

1. If retail clients can obtain their score (default risk rating) on line and shop around for the best deal, why not corporate and business clients?
2. If the cost of the bank manager (relationship manager) interview process is too high (and slow) why not transfer some or all of that cost to a willing user?
3. If there is a trade-off between price, term and structure why not have the client build his own loan?
4. If retail bankers can use a single scorecard for a bank manager, dentist or steelworker, why do corporate bankers insist on multiple scorecards?
5. If retail bankers compete based on service, convenience, lack of bureaucracy, use of technology should corporate bankers consider other means to reach and maintain their clients?
6. If the risk score is valuable to the bank, would it not also be valuable to others deciding on credit extension?

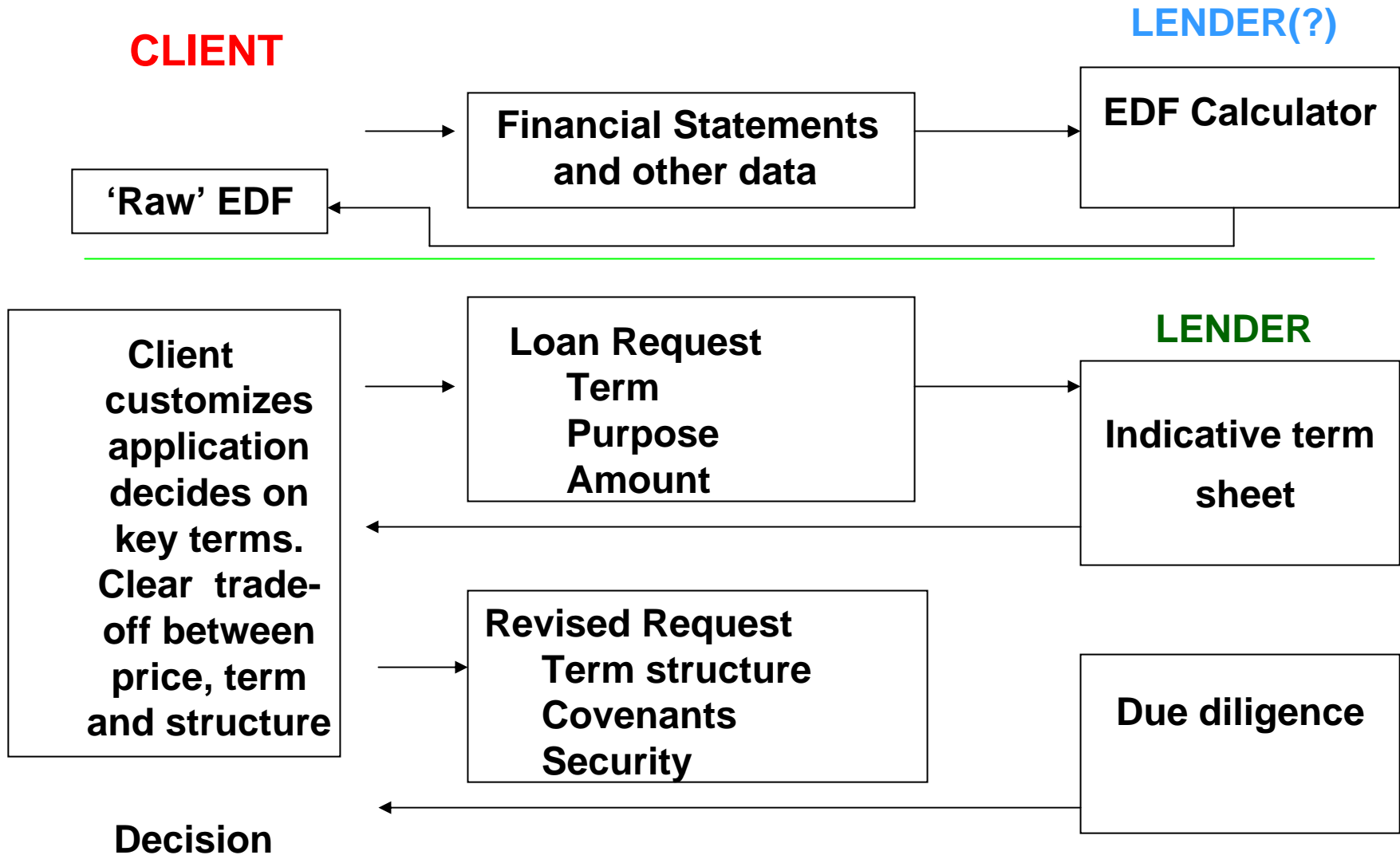
Moving Toward the Retail Process

If retail clients can obtain their score (default risk rating) on line and shop around for the best deal why not corporate and business clients?

If the cost of the bank manager (relationship manager) interview assessment process is too high and too slow why not transfer some or all of that cost to a willing user?

If there is a trade-off between price, term and structure why not have the client build his own loan?

Build Your Own Loan



Moving to the Retail Process

If retail bankers can use a single scorecard for a bank manager, dentist or steelworker, why do corporate bankers insist on multiple scorecards?

The culture of credit is such that every corporate loan is seen as a decision with unique risk characteristics. It is assumed that accumulated wisdom and the policy framework captures the unique characteristics of a number of borrower types.

This assumption should mean that some banks are visibly more successful in dealing with certain types of businesses? There is little evidence to support that view. Is there demand for MKMV to build multiple Credit Monitor/Credit Edge versions?



Driver analysis reveals key risk issues...

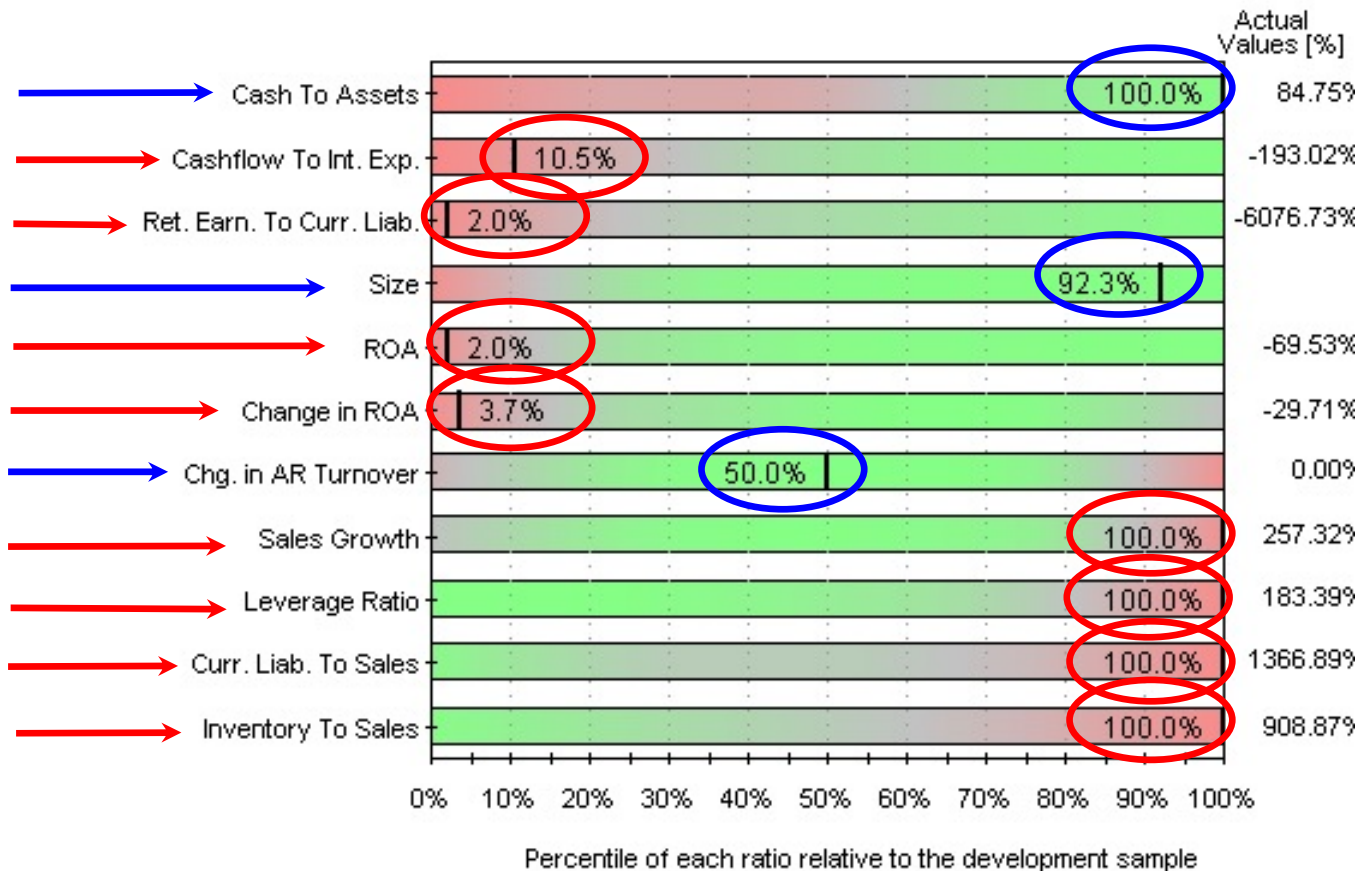
	Relative Contributions		Relative Sensitivities		Percentile	Ratios or Level
	1-Year	5-Year	1-Year	5-Year		
ROA	25.40%	12.69%	-80.09%	-33.08%	2.00%	-69.53
Sales Growth	8.96%	12.73%	55.31%	64.90%	100.00%	257.32
Cash to Assets	-11.61%	-12.12%	-34.30%	-29.61%	100.00%	84.75
Change in AR Turnover	-2.61%	-2.13%	-36.24%	-24.40%	50.00%	0.00
Change in ROA	9.84%	10.16%	-26.01%	-22.18%	3.71%	-29.71
Inventory to Sales	2.91%	6.02%	21.01%	35.89%	100.00%	908.87
Cash Flow to Interest Expense	6.63%	8.82%	-656.48%	-722.14%	10.53%	-193.02
Retained Earnings to Current Liabilities	9.79%	11.47%	-38.19%	-36.98%	2.00%	-6076.73
Current Liabilities to Sales	6.89%	6.94%	15.90%	13.24%	100.00%	1366.89
Leverage Ratio	14.40%	14.83%	134.93%	114.80%	100.00%	183.39
Size	-0.95%	-2.09%	-1.54%	-2.78%	92.27%	1891.54



Drivers Chart Highlights Risk Issues Identified in the Model

Risk Reducing Factors (blue arrows)
Risk Enhancing Factors (red arrows)

Percentile Graph



Moving to the Retail Process

If retail bankers compete based on service, convenience, lack of bureaucracy, use of technology does that mean that corporate bankers should consider other means to reach and maintain their clients?

Many borrowers are not seeking a relationship, they are seeking money or access to money. Their desires are polar opposites to those of the banker.

Many bankers have advanced finance knowledge and can provide valuable advice and counsel. If this is offered as a sales inducement it will not be seen as interference based on protection of the debt, but as a selection criteria. (The 'private banker' approach)

Many (perhaps the majority) of small businesses are net *depositors*. The relationship banker should therefore be seeking opportunities in investment and cash management. Seek out those who do not need an umbrella!

Moving to the Retail Process

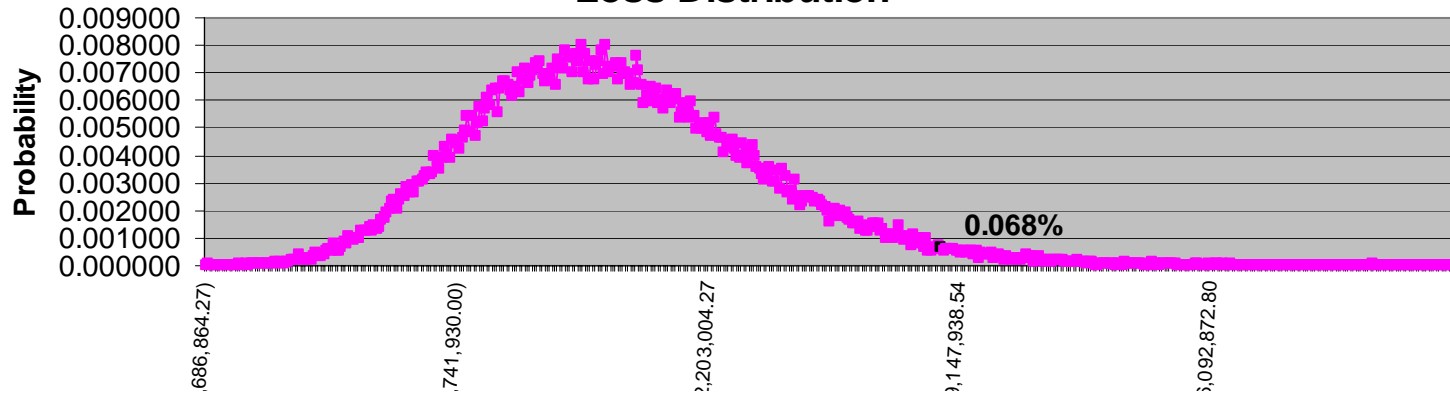
If the risk score is valuable to the bank, would it not also be valuable to the marketplace for those deciding whether to grant the same business trade credit, lease financing or other forms of credit?

Currently there is some reliance based on Dunn and Bradstreet or the Better Business Bureau, but these services do not provide very much in the way of relativity.

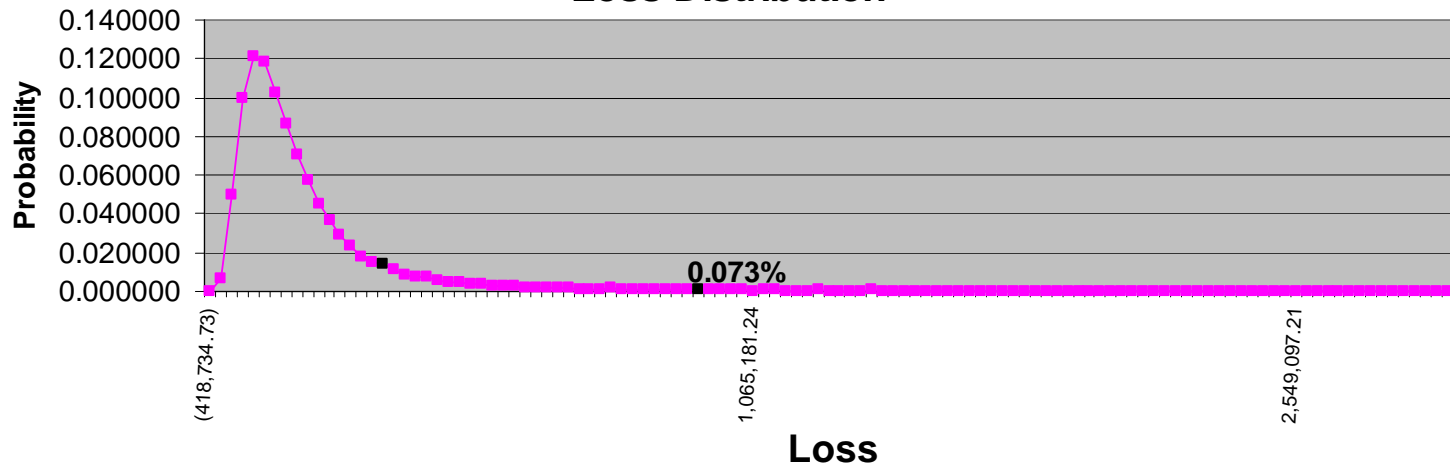
Private firms in North America are generally private, unlike most of Europe their financials are unavailable. By providing them to a scoring service or agency the potential lender/creditor can obtain a risk assessment that can be seen as consistent and capable of ranking.

Actual Portfolio Manager Results: Consumer & Commercial

Small Retail Portfolio Loss Distribution



Extremely High Quality Corporates Loss Distribution



Summary

In the retail model, risk assessment is delegated to a database with sub routines designed more for marketing than risk detection. Consumers accept scores because it allows them easy access to credit. They do not understand **HOW** the score is reached but know that it is consistent.

In the business model of credit risk we have been persuaded that great skill and discrimination is needed for each individual loan. There is no obvious reason why this persuasion should remain.

The advantages for both banker and client of moving to a net-based common measurement of default risk should be considerable:

- Greater understanding of risk measures

- Collaborative customization of loans

- Transparency of pricing plus linkage to structure and term

- Redefinition of 'relationship'

The Pessimistic View



“We learn from history that man can never learn anything from history”

Georg Wilhelm Friedrich Hegel

The Optimistic View?



**“The future will be
better tomorrow”**

Dan Quayle