Risk Management

Myth, Black Swan or Value Add?

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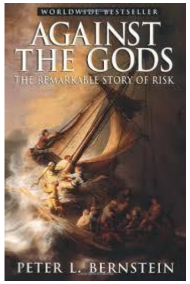
Risk Management is a new discipline



"All the tools we use in risk management and in the analysis of decisions and choice stem from the developments that took place between 1654 and 1760."

Until the Base 2 reforms to banking supervision, operation risk was largely a residual category for risk and uncertainties which were difficult to quantify, insure and manage in traditional ways

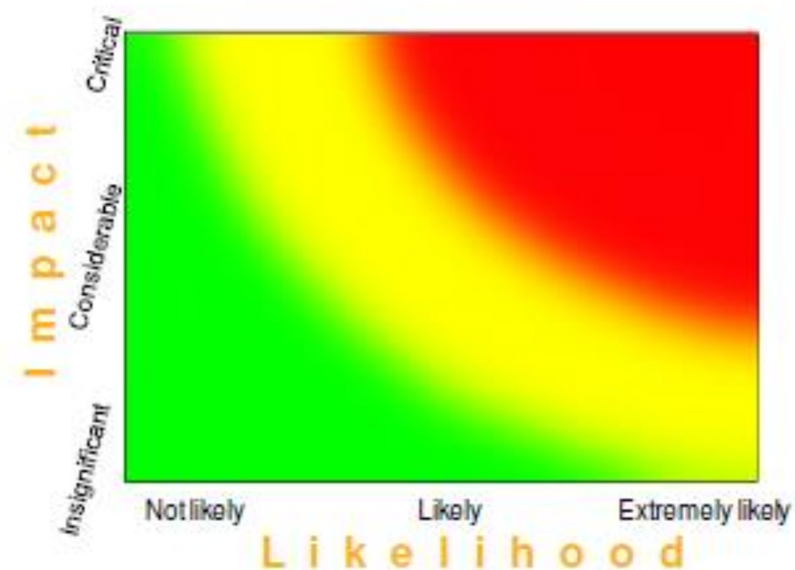
1945 - 1964	1955 - 1970	1970 - 1990
Studies in risk management begin Covered pure risk management Excludes corporate financial risk	New forms of risk management emerge Alternatives for market insurance	Derivatives for insurable/uninsurable risk Financial management in risk portfolios Market and Credit risk (80s) Operational Risk and Liquidity risk (90s)

All these regulations, rules, and risk management methods did not suffice to prevent the financial crisis that began in 2007. It is not necessarily the regulation of risks and governance rules that were inefficient, but rather their application and enforcement." [G Dionne, Cirrelt, 2013]

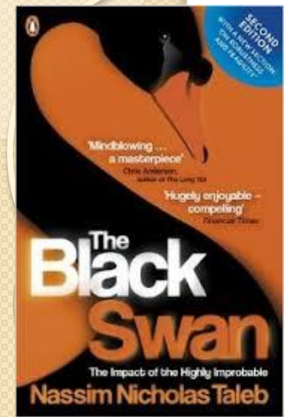
1990-2000	2000 - 2006	2007 - 2010
International regulation of risk Internal risk models Capital calculation formulas (VAR) Governance of risk Integrated risk management	Scandals and bankruptcies from poor RM (Enron, Lehman Brothers, Foreign exchange rigging – Barclays, JPMorgan, UBS, Bank of America, Citigroup) Sarbanes-Oxley	Financial crisis Basel Accord

Risk = likelihood x impact

- Risk is the uncertainty of events on objectives [ISO 31000]
- "The risk of loss resulting from inadequate or failed internal processes, people and systems or from external events" [Basel Framework 2004]
- A specific risk has a single likelihood and single impact



- Does this diagram identify risks that really matter?

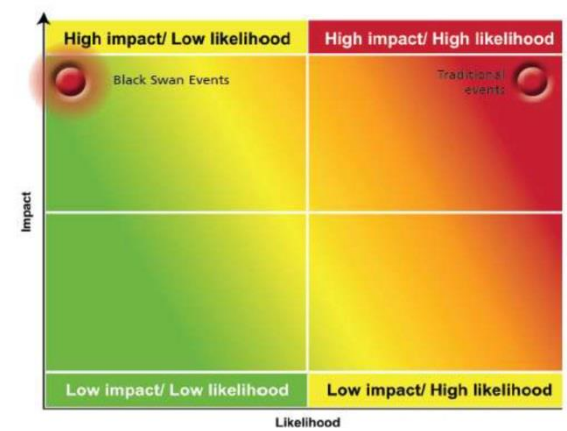


Black Swan

- *"A Black Swan is a highly improbable event with three principle characteristics: its unpredictable; its massive; and, after it has happened, our desire to make it appear less random and more predictable than it was. The astonishing success of Google was a Black Swan; so was 9/11"*

  - Prof Nassim Nicolas Taleb

- Unimaginable events might have devastating consequences and all attempts to harness such events in a model are futile at best and harmful.
- Risk managers should simply just give up



Value Add

Myth

- Risk is the uncertainty of events on objectives
- Risk = Likelihood x Impact
- Focus on high impact, high likelihood and black swan events (high impact, low likelihood)
- No financial benefit

Value Add

- Risk is a deviation from expected results
- Explore a risk at a likelihood and impact value
- Focus on very low likelihood risks through scenario's (Blank swan – E Ayache)
- Focus on weak controls in the environment
- Ensuring risk management is integral part of strategic planning;
- Integrate and align risk, compliance and audit techniques;
- Capital requirements

Conclusion

Of all the perils that banks face, operational risk is the most amorphous and the hardest to protect against."

Source : FT November 2012

"Operational Risk is perhaps the most significant risk organisations face. Virtually every major loss that has taken place during the past 20 years….has been driven by operational failures"

…in a modern ORM environment, senior management views operational risk not as an afterthought, but as an integral part of the strategic planning, business management and enterprise risk management process.

Source : Kellogg.northwestern.edu