A view on

Project Risk Management

It is O.K. to be wrong but not to be uncertain

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Are you satisfied with the success of your projects?

- Executives know they compete in a world where "no information technology" means "no business."

KPMG Survey – November 2005

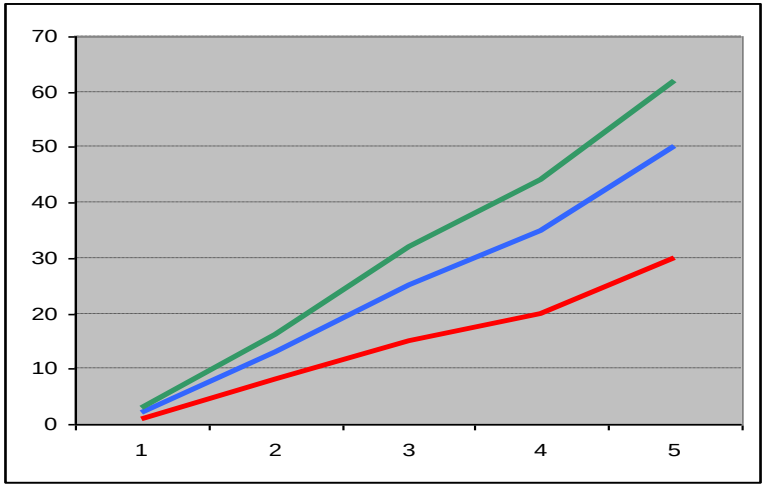
- 600 organizations across 22 countries found that many are failing to deliver the value expected from their large IT projects, with nearly half of the respondents experiencing at least one project failure in the past year.
- A key finding is that 86 percent of respondents report losses of up to 25 percent of targeted benefits across their project portfolio.

Gartner Group (Survey 2000)

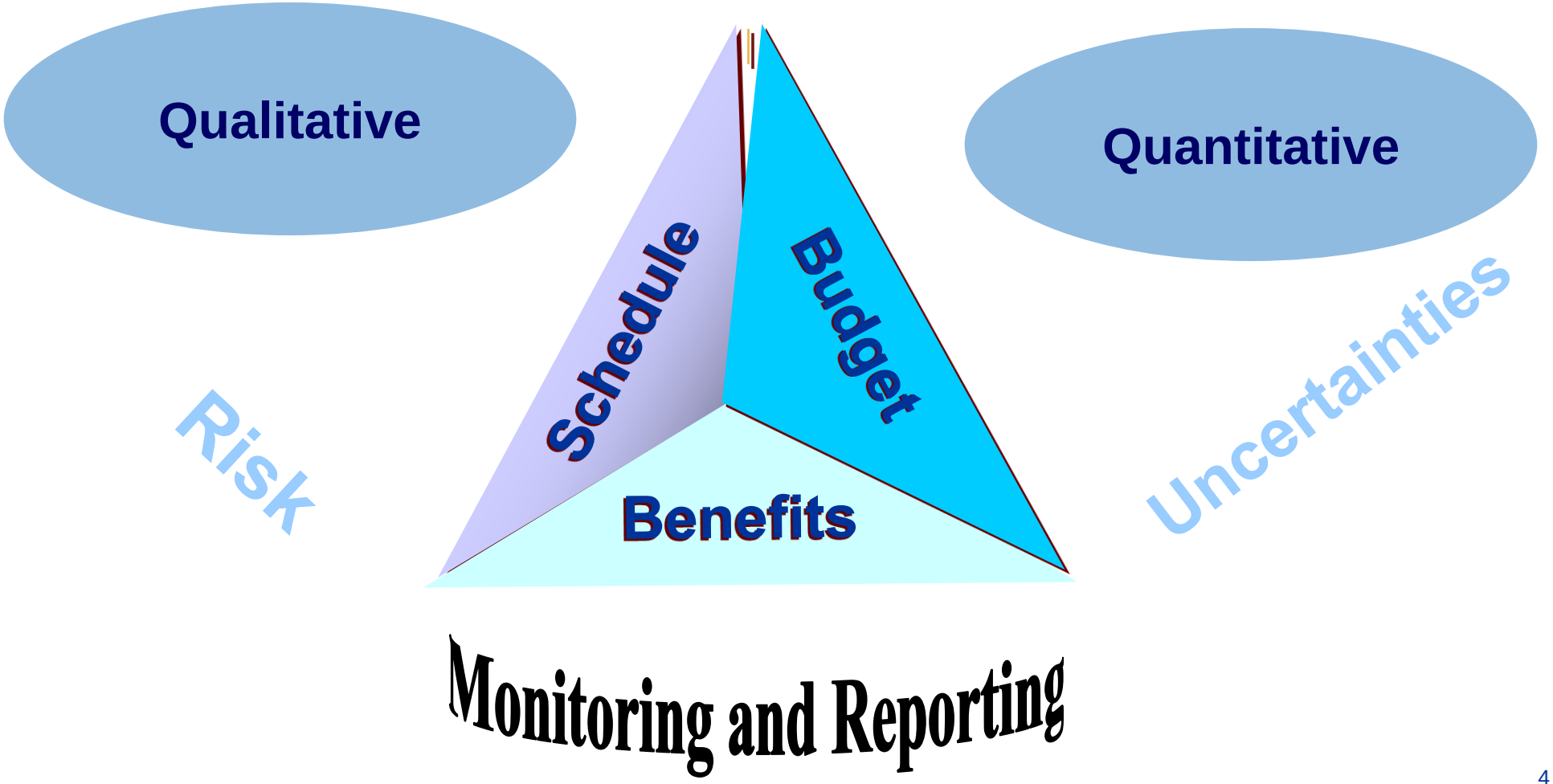
- 30 % of all IT projects are never completed successfully, 51 % overrun their budget with an average of 189 % and only 74 % deliver a system with the agreed functionality.

Are Project Risks not also Operational Risks ?

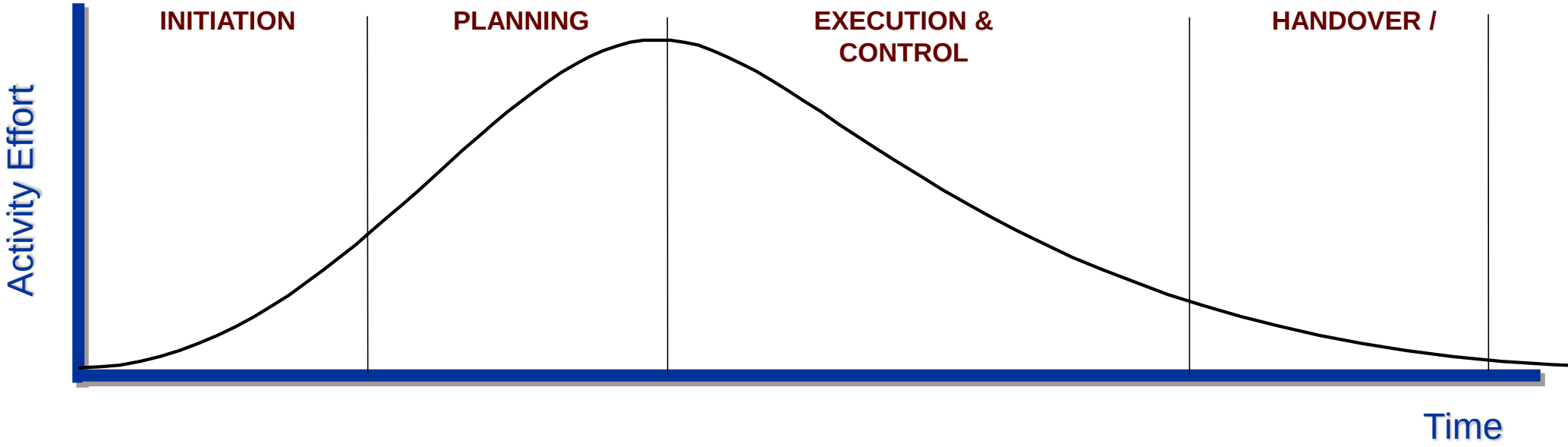
- Project Risks are a substantial part of Operational Risks but are not sufficiently made transparent
- The traditional Project Planning Process deals poorly with uncertainty. **We don't know whether the "Base Case" is the mean, mode, median or an arbitrary product of negotiation.**
- Recognized need for the systematic management of project risks as part of the project management methodology
- Project Risk Quantification and Modeling
  - Determining confidence levels for project success



Balancing Qualitative and Quantitative Approach



Project Phases



- **Business Case**
- **Project Charter**
- **Project Schedule**
- **Budget**
- **Manage Resources**
- **Monitor Deliverables**
- **Client Acceptance**
- **Lessons learnt**

Qualitative Risk Assessments

Quantitative Risk Modeling

Business Case Sensitivity

Project Schedule Modeling

Qualitative Project Risk Management

- **Systematic risk and issue identification**
  - Most risk templates or worksheets are very generic and are often not relevant to specific projects or industry.
  - Provide information from lessons learnt as input for the risk identification.

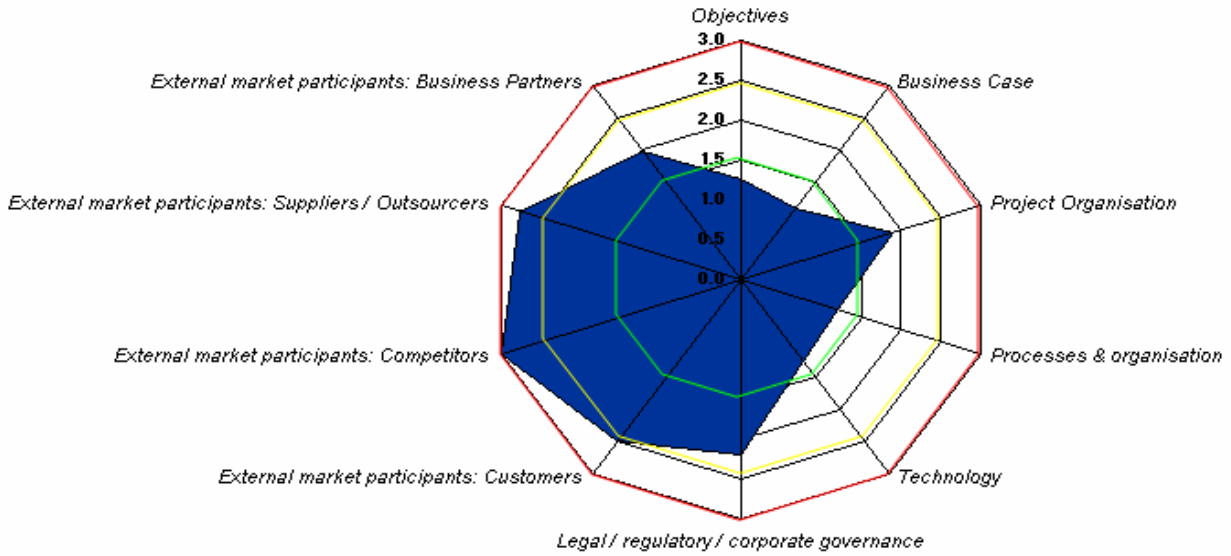
- **The optimism bias or a strategic misrepresentation** (Kahneman, Lovallo)
  - the demonstrated systematic tendency of people to be over-optimistic about the outcome of planned actions
  - Perceive as lying outside of the specific scope of a project. Project managers also may discount multiple improbable high-impact risks because each one has very small probability of occurring.

- **Communication – instill a project risk management culture**
  - Accountability of project managers to complete their task in time and within budget
  - Compliance to risk management policy

Transparency in qualitative risk assessments

Risk Area	Risk Rating	Total Questions	High Risks			Medium Risks			Low Risks			Not applicables	Not answered
			Answers	Scenarios / Issues		Answers	Scenarios / Issues		Answers	Scenarios / Issues			
				Mgmt	Risk		Mgmt	Risk		Mgmt	Risk		
Objectives	1.3	6	0	0	0	2	0	0	1	0	0	1	2
Business Case	1.1	11	1	2	0	3	0	0	2	0	1	4	1
Project Organisation	1.9	17	4	0	0	3	0	0	1	0	0	2	7
Processes & organisation	1.2	10	2	0	0	1	0	0	3	0	1	3	1
Technology	1.3	10	1	0	0	2	0	0	3	0	0	2	2
Legal / regulatory / corporate governance	2.2	9	2	0	0	2	0	0	1	0	0	0	4
External market participants: Customers	2.5	4	2	0	0	2	0	0	0	0	0	0	0
External market participants: Competitors	3.0	2	2	0	0	0	0	0	0	0	0	0	0
External market participants: Suppliers / Outsourcers	2.8	4	3	0	0	1	0	0	0	0	0	0	0
External market participants: Business Partners	2.0	4	1	0	0	2	0	0	1	0	0	0	0

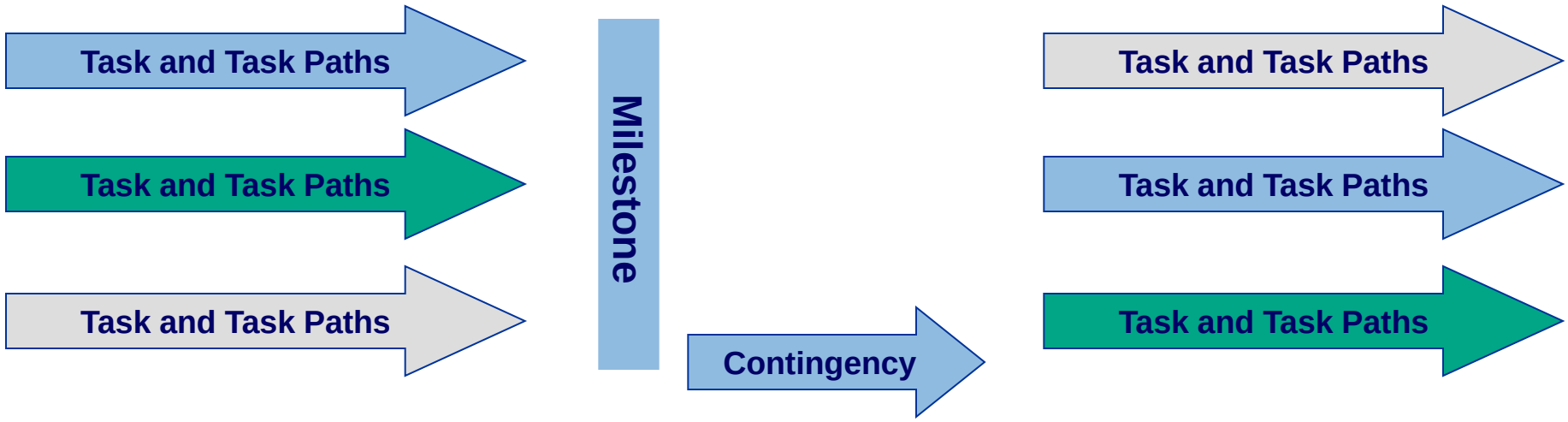
Number of Mgmt Issues and Risk Scenarios created in Autopsy Mgmt Issues: 0 / Risk Scenarios: 2



Quantitative Risk Management

Project Schedule Modeling

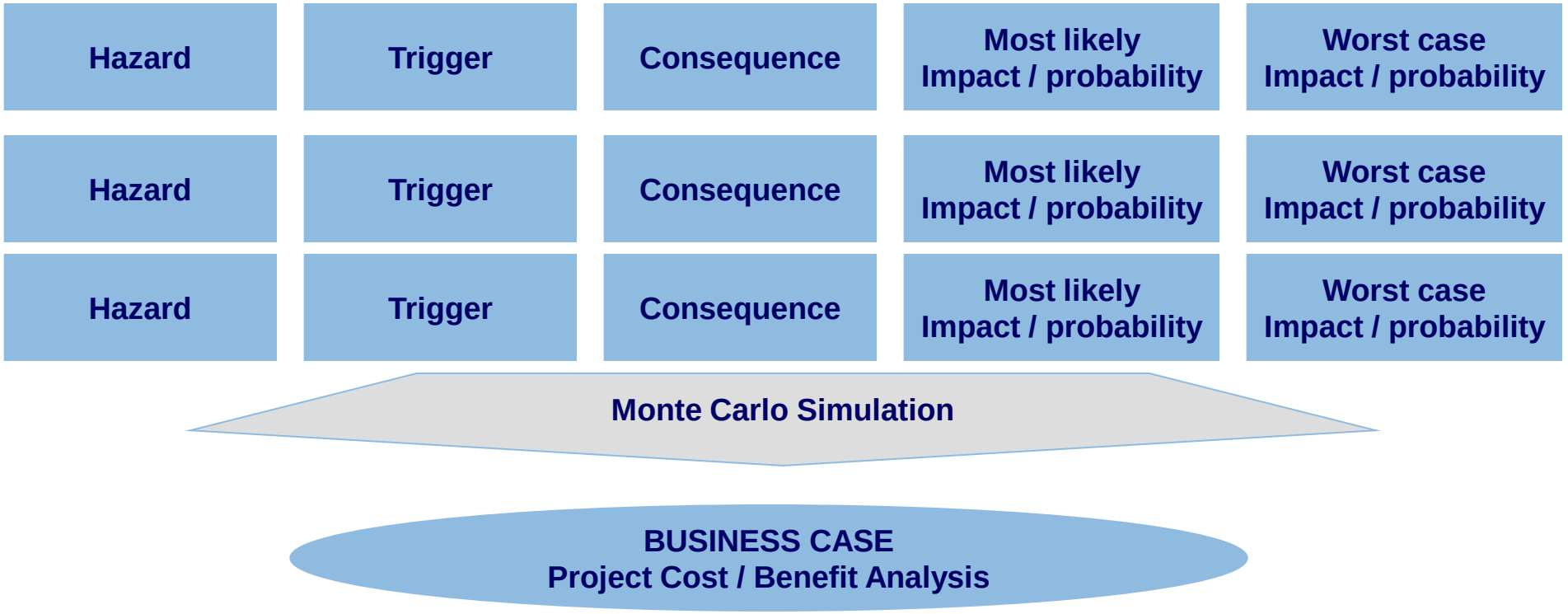
- Creating accurate and agreed project schedules, which reflect potential risks and uncertainties is the main challenges in project management.
- Visualization of complex relationship between different uncertainties and risk events that may occur at unknown times and which may be correlated with each
- Review the sensitivity of project task durations to provide transparent finishing time of the project



Quantitative Risk Management

Business Case Sensitivity Modeling

- Identify risk scenarios which affect time, cost, expected benefits
- Assess most likely - and worst case in terms of probability and impact
- Forecast potential business success through Monte Carlo simulation



Aspired benefits

1. Improve the breadth and depth of qualitative risk assessments through the establishment of more transparency within the process
   - influencing the negative effects of motivational and cognitive biases and improving the accuracy of estimation as well as forecasting
   - Combine issue management with risk assessment
2. Achieve a relationship between risk management and project management whereas the modeling efforts are perceived as an essential added value within the project management process
3. Perform more accurate quantitative analysis at the outset of the project (approval of project) as well as an early warning monitoring process
4. Provide a framework which includes Project Risks as an integral part of Operational Risk