BRISK Analysis™

Description

- The Brief Risk (BRISK) Analysis was devised in 1995 using a small group of experier
- This document is not a guide on how to perform a risk analysis. Nevertheless, the te

Version 2 introduces EMV to quantify impact, and is highlighted using different colours
attempts to be more objective, and the quality is fully based on the quality of the finar

Using the BRISK Register

- As a general rule, do not edit shaded cells as they may contain formulæ.
- It is recommended to proceed and populate the fields in the following order:-

TITLE	DESCRIPTION
MAJOR RISK	• Risk events that may occur, and would affect the project objectives. Hence, they would be things we would wish to avoid, or mitigate. • Different areas where risks may occur are separated.
	TECHNICAL
	PRODUCT / REQUIREMENTS
	PERSONNEL

	ADMINISTRATION / MANAGEMENT
	SUPPLIER / EXTERNAL
	OPERATIONAL / DEPLOYMENT
	XXX
PROBABILITY	What is the likelihood that this event will occur? Mathematically, probability is a value between 0 and 1. The drop-down menu shows 10% to 90%, because 0% means never, and 100% means the risk event is actuallly a fact, so these two values are excluded.
IMPACT	This is a *qualitative* assessment (based on experience and judgement) of the scale of the consequences of a risk event. The drop-down menu uses a Fibonnaci sequence which helps arrive at more realistic scores, and avoids trying to understand the difference between 4 and 5.
PRIORITY	PRIORITY = PROBABILITY x IMPACT. The highest scores, indicate the risk events that deserve the most attention.

IMPA€T **kUSD**	In comparison to the previous IMPACT definition, this is a *quantitative* estimation of the scale of the consequences of a risk event. Risks potentially cause delays and extra costs. Delays also cause costs.
EMV	Expected Monetary Value (EMV) = PROBABILITY x IMPACT €. It represents the average expected financial effect of a risk. EMV has several uses:- • Quantify risks financially • Prioritise risks • Calculate contingency reserves
PRE-EMPTIVE ACTION	What can we do to avoid the risk completely, reduce the likelihood of it occurring, or transfer it to someone else?
CONTINGENCY PLAN	If (despite our pre-emptive actions) the risk event occurs, what can we do to reduce the impact of its effects and contain the damage.

Project Risk Budgets

There are two project budgets that should be defined so the project manager can cont
mentioned because EMV can be used to calculate the Contingency Reserve. This highl

Project Budget	Used for

Contingency Reserve	Known unknowns. (i.e. risk events that were identified in the BRISK register).
Management Reserve	Unknown unknowns (i.e. adverse events that were not foreseen during risk analysis). This is an important budget for stakeholders to secure delivery of a project in the face of unknown challenges, because project budgets are often fixed. A lot of time can be saved, and ability to act quickly enhanced, if this budget is decided at the same time as the project budget.

ıced people for 2-4 hours, instead of 20-30 people spending multiple days.
mplate and instructions can hopefully help teams reach a better outcome in this typically challenging exercise.

s. The original PRIORITY is used to address most important risks, and is derived from the combined experience of the team. EMV
ıcial impact estimates. A psychological risk is that humans tend to believe numbers are real, and ignore the underlying assumptions.

USAGE
• These are risks, not facts. If you already have a restrictive budget, that is a fact which needs to be organised or dealt with by project management. • Focus the team effort by identifying risks in one area at a time.
e.g. new or unproven technology, integration failure, low performance, limits to scale, cybersecurity vulnerabily, obsolescence, component incompatibility, architectural dead-ends.
e.g. Unclear or changing requirements, scope creep, regulatory compliance, late usability flaws, over-engineering.
e.g. Key person dependency, loss of staff, skills gap in new technology, low team motivation, interteam communication, overcommitment or resource overload.

e.g. unrealistic schedule, budget overrun, poor milestone definition, inadequate risk monitoring, weak stakeholder alignment, delayed decision-making, poor change control.
e.g. delayed hardware components, vendor bankruptcy, subcontractor quality issues, licencing problems (software/IP).
e.g. manufacturing defects, installation complexity, support readiness missing, insufficient training, data migration failure.
Include any other areas which are relevant for the project (e.g. strategic, financial, legal, security, environmental, sustainability, governance, brand, force majeur).
Discuss amongst the team to agree on a value. A proven procedure is as follows:- 1. Each member privately writes one of the drop-down values on a post-it sticker. 2. All stickers are shown at the same time. 3. Highs and lows give a brief explanation defending their values. 4. Repeat steps 1-3 three times, or until the values stop converging. 5. Pick a single value to best represent the different estimates.
Use Planning Poker cards, which use these Fibonnaci numbers. 1. Each member privately selects a card to express the potential impact of this risk relative to the previously estimated impacts. N.B. Start with a familiar risk event and give it a mid-range value. That way, all other risks can be estimated relative to that one. 2. Everyone shows their cards at he same time (ready, set, ... go!) 3. Highs and lows give a brief explanation defending their values. 4. Repeat steps 1-3 three times, or until the values stop converging. 5. Pick a single value to best represent the different estimates.
• Discuss whether the team agrees that the ranking outcome seems logical and reasonable. Adjust PROBABILITY or IMPACT if necessary. • Highlight the highest scores that need to be addressed by project management (e.g. fill cell red, or make font red).

Record the assumptions and methods used to estimte the financial impact under REMARKS, so that these can be challenged and improved. Express IMPA€T in the most relevant currency, and modify this in the heading.
• Discuss whether the team agrees that the ranking outcome based on EMV seems logical and reasonable. Adjust PROBABILITY or IMPA€T if necessary. • Refer to next section for Contingency Reserves.
There can be more than one action per risk event.
The plan should also include actions to take to prepare for the responses.

:rol the risks in a project: Contingency Reserve and Management Reserve. They will now be explained in detail here, but only ·ights further the importance of estimating EMV as accurately or realistically as possible.

Controlled by	Calculate

Project Manager. This means that the PM may use this budget at his/her discretion to cover the actual cost of dealing with the impacts of identified risk events. This should be shown explicitly in the accounting:- 1. Risk event X occurred, with EMV X kUSD. 2. Actual cost incurred due to risk event X was Y kUSD, which is covered by Contingency Reserve, which means that the original project budget has not been adversely affected by risk event X.	Use the Monte Carlo method, or is available EMV from the BRISK register. The PM could present the main risks that should be addressed when negotiating the budget with upper management. The costs for pre-emptive measures are already included in the main project budget, and hopefully obviate the need to use the Contingency Budget.
Upper management. Project Manager must approach Upper Management for access to this budget.