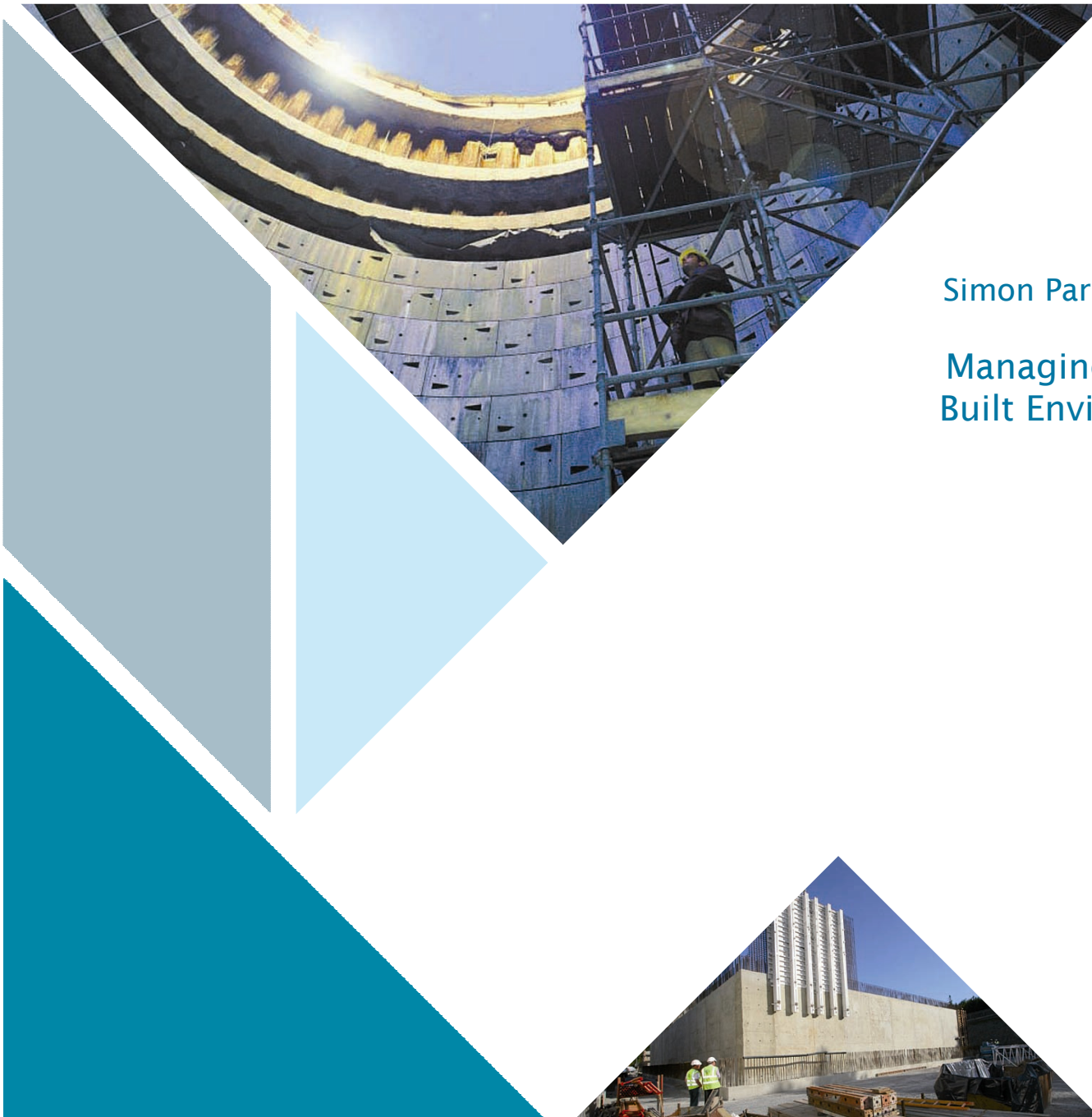




Simon Parkhouse | 26 October 2012

Managing Risk: The Views of the
Built Environment Professional in
Wales

The Cost Manager



Inspired Innovative Individual

The Cost Manager's View of Risk

- **Appearance of Risk**
- **Risk Management Process**
- **Top 5 errors in dealing with risks**



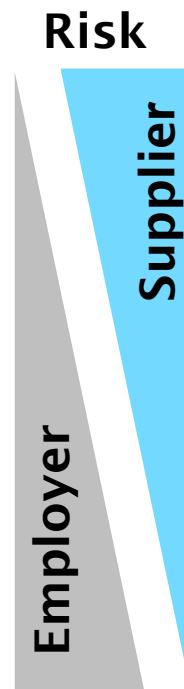
The appearance of Risk

Risk Profile defined by early decisions:

- Procurement
- Drivers for the project
 - Time
 - Quality
 - Cost

**ENSURE YOUR CLIENT UNDERSTANDS THE CONSEQUENCES OF
EARLY DECISIONS**

Contract Risk



- Lump sum
- Measure and value
- Target price
- Measure and cost
- Cost reimbursable

Where is Risk found?

- Specification
- Design
- Base cost
- Risk allowance
- Contingency allowance

Risk Management Process

Hard Benefits

- ✓ Better informed plans & budgets
- ✓ Adherence to plans
- ✓ Better assessment of contingencies
- ✓ Discourages acceptance of unsound projects
- ✓ Develops data base of experience
- ✓ Objective comparison of alternatives
- ✓ Allocates risk to most appropriate owner

Soft Benefits

- ✓ Communication
- ✓ Promotes team working
- ✓ Risk awareness
- ✓ Focus on major issues
- ✓ Facilitates risk taking
- ✓ Responsible approach

Risk Management Process

RAMP

- ✓ Risk
- ✓ Analysis and
- ✓ Management for
- ✓ Projects

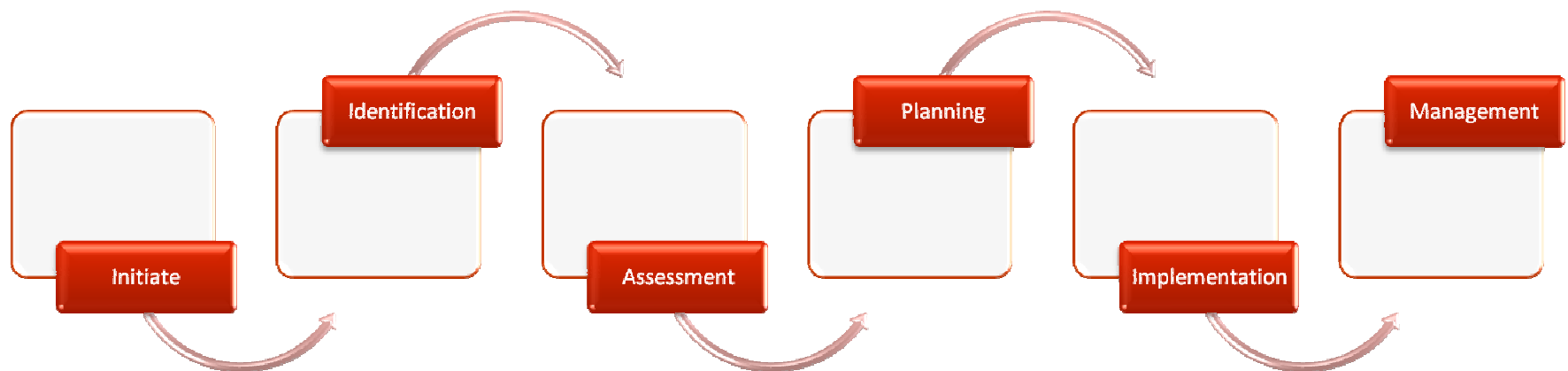
ICE

PRAM

- ✓ Project
- ✓ Risk
- ✓ Analysis and
- ✓ Management

apm

Risk Management Process



Initiate

- Define what the methodology will be
- Ensure a common understanding

Identify

- Perceived risks relating to the project
- Engage the team ; consult with stakeholders
- Use lessons learnt from previous projects

Assess

- Identify consequence of risk
- Assign a risk owner
- Estimate the impact and priority
- Evaluate the cost

Risk Values

		Impact				
		Very Low 1	Low 2	Medium 3	High 4	Very High 5
Probability	Very High 5	5	10	15	20	25
	High 4	4	8	12	16	20
	Medium 3	3	6	9	12	15
	Low 2	2	4	6	8	10
	Very Low 1	1	2	3	4	5

		Impact				
		Very Low 1	Low 2	Medium 4	High 8	Very High 16
Probability	Very High 5	5	10	20	40	80
	High 4	4	8	16	32	64
	Medium 3	3	6	12	24	48
	Low 2	2	4	8	16	32
	Very Low 1	1	2	4	8	16

Evaluation

Simple calculation

e.g.

	Prob		Likely		total
Risk A	5%		£250k		£12.5k
Risk B	10%		£100k		£10k
Risk C	15%		£200k		£30k
			Risk Total		£52.5k

Evaluation

3 point calculation

e.g.

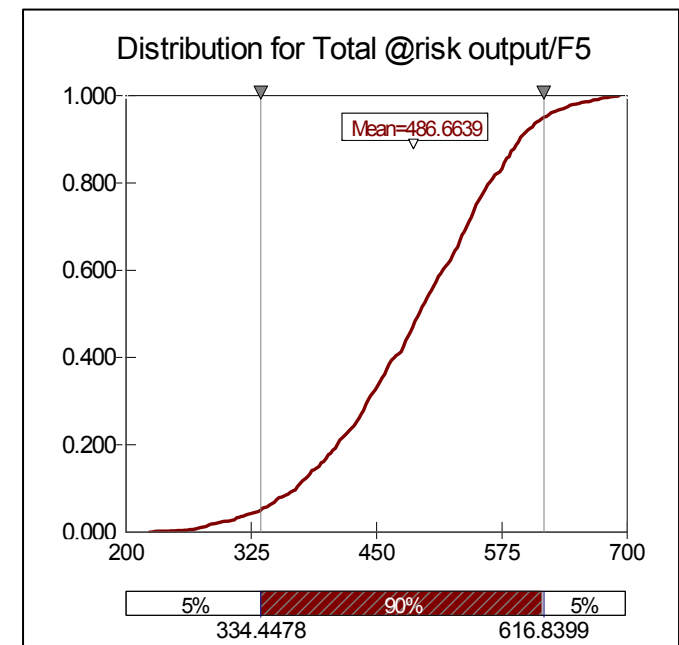
	Prob	Min	Likely	Max
Risk A	5%	£10	£250k	£350k
Risk B	10%	£75k	£100k	£175k
Risk C	15%	£50k	£200k	£250k

Evaluation

Monte Carlo simulation

e.g. Looks at many iterations of combinations of risks occurring and gives an indication of confidence bands

	Prob	Min	Likely	Max
Risk A	5%	£10	£250k	£350k
Risk B	10%	£75k	£100k	£175k
Risk C	15%	£50k	£200k	£250k



Plan

Eliminate

Reduce

Investigate

Control

Reduce

Reduce

Define

Transfer

Transfer

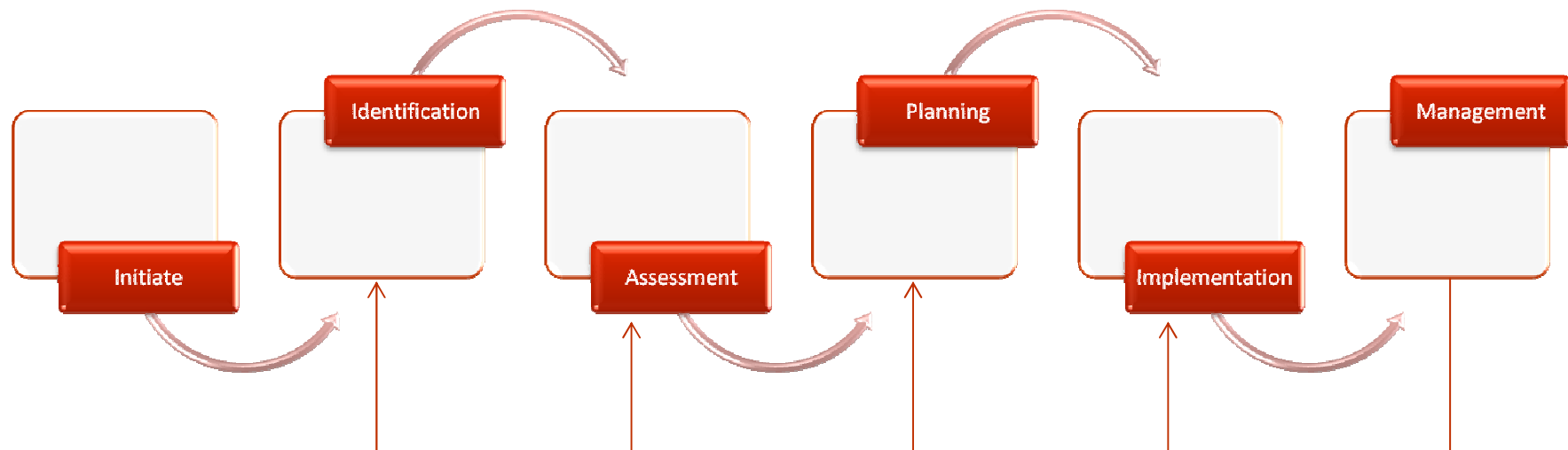
Implement

- Make sure any actions and mitigations are carried out



Manage

- The process is dynamic



Top 5 errors in dealing with risk?

- Assuming risk can be passed to others with no financial cost transfer
- Assuming that production of risk register is risk management
- Lack of Site Investigation
- Approach to risk evaluation too simplistic
- Risk assessment and evaluation left to one party

Services

- Cost Management & Estimating
- Project Management
- Due Diligence
- Procurement Advice
- Capital Allowances and Taxation
- Regulatory Reporting
- Dispute Resolution
- Fund Monitoring
- Expert Witness

