# **JAMES A ROBERTSON AND ASSOCIATES EFFECTIVE STRATEGIC BUSINESS SOLUTIONS**



**1.** Context and Definitions and World Class ERP Capability

1010101010101010101010 101010101001010 10100101010101 O10 1010101 10101010101010101010100 O 10010010101 0101010101010 01 010101 010101 1010101010101010101010 010 10101010101 00 O 1001010 Why your ERP is NOT delivering and how to FIX it

The Critical Factors for Information Technology Investment Success

Two Day Course

**Dr James Robertson Chief Executive Officer James A Robertson and Associates** James@JamesARobertson.com Copyright 2004 - 2011

# THE CRITICAL FACTORS FOR I.T. INVESTMENT SUCCESS



#### **THIS COURSE**

- Business solution orientated approach
- Drawing on engineering principles
- Equip with ESSENTIAL KNOWLEDGE in order to create a context for successful outcomes
- MINIMIZE risk and
- MAXIMIZE long term business return

# **POSITIONING THIS COURSE**

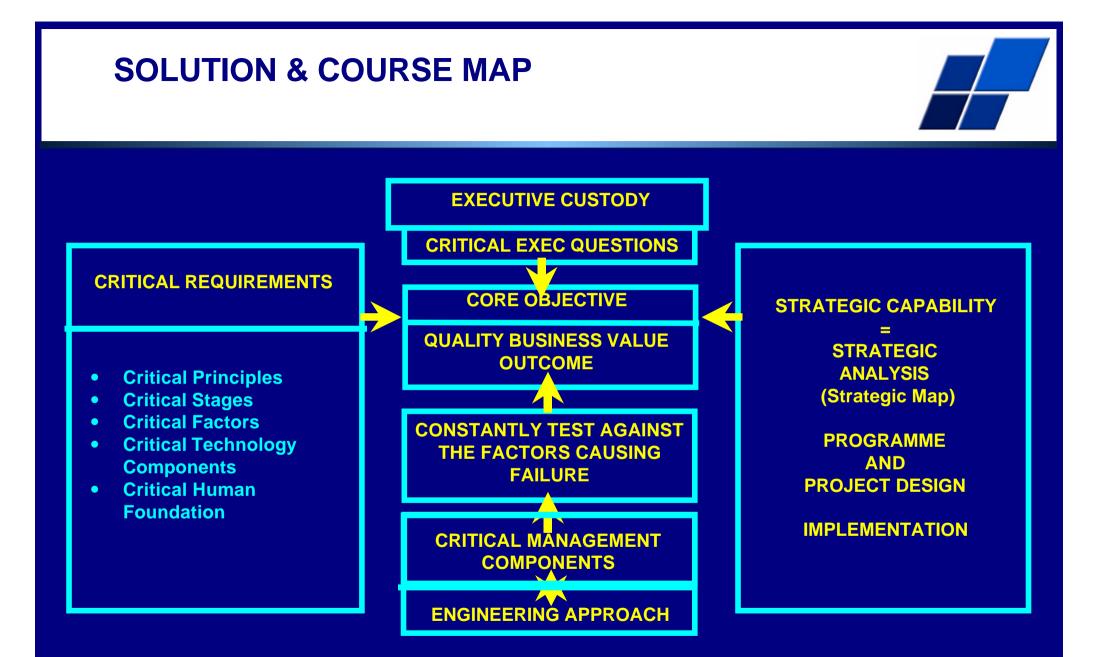


- 1. Appropriate, well implemented information technology applications can add substantial value
- 2. Sometimes they can add dramatic value
- 3. Such I.T. solutions can be <u>delivered successfully</u>
- 4. Such I.T. solutions can be <u>delivered economically</u> and in <u>realistic time</u> <u>frames</u>
- 5. <u>Doing it right is cheaper</u> than doing it wrong
- 6. <u>Doing it wrong is always more expensive</u> than the client organization can afford
- 7. As evidence of my conviction that dramatic success is economically attainable it is important to note that I have spent most of my career seeking ways of <u>getting IT right first time reliably and sustainably</u>

# CONTEXT: INFORMATION TECHNOLOGY SOME DIAGNOSTIC INDICATORS

- **1.** Poor communication with I.T. staff
- 2. Replacement of systems "got the wrong" software
- **3.** Cannot get the information I need
- 4. Reliant on spreadsheets for management information
- 5. "Technology is moving so fast we cannot keep up"
- 6. Outsource or insource?
- 7. We cannot integrate without buying new systems





## CONTEXT: INFORMATION TECHNOLOGY GOVERNANCE DEFINED BY KING



#### 1. <u>Governance = Care!</u>

- 2. How does this company make money? What are our competitors doing? <u>What can destroy our business?</u> More satisfied employees. More Capital.
- **3.** I.T. -- should we take something like COBIT and enforce or have certified managers?
- Board is responsible for I.T. Systems and does it have effective control, part and parcel of strategic view.
- Ultimate responsibility is business success. Balance conformance and performance. <u>Legislation is NOT the recipe for good governance.</u> Increased cost of running the business.

Presentation on "I.T. Governance" to the I.T. Governance and Strategy Summit on 22 August 2006 by Professor Mervyn King SC, former High Court Judge and author of the King reports on Corporate Governance. Free hand notes taken by J Robertson during the presentation.



- 1. <u>"This [I.T.] is an area where boards of directors will be named in</u> stockholder suits"
- 2. <u>"Senior management is not engaged enough in strategic information</u> <u>technology decisions and situations that could put the company at risk."</u>
- 3. <u>"Information systems could cause the next outbreak of Enron-like</u> corporate scandals."

4. <u>1.T. is the next corporate disaster waiting to happen</u>

"Creating an IT Watchdog for the Board by Assembling an I.T. Oversight Committee" presented to the I.T. Governance and Strategy Summit by Professor Rossouw von Solms of Nelson Mandela Metropolitan University quoting Richard Nolan of Harvard Business School in Harvard Business Review



- 1. I T is now seen as being an integral part of enterprise strategy rather than a mere enabler within organizations
- 2. Almost all organizations today are absolutely dependent on I.T.
- **3.** Major I.T. Write-Offs
  - After spending seven years and close to <u>half a billion dollars</u> implementing a mainframe E.R.P. system, the Dow Chemicals Co stopped and started over with a client-server version
  - Nike -- <u>\$400 million</u> against their supply chain management system
  - Disney -- <u>\$878 million</u> against its go.com web portal
  - Kmart -- <u>\$195 million</u> against supply chain hardware and software
  - Gateway -- <u>R143 million</u> against I.T. projects no longer fitting its strategy

"Creating an IT Watchdog for the Board by Assembling an I.T. Oversight Committee" by Professor Rossouw von Solms of Nelson Mandela Metropolitan University at the I T Governance and Strategy Summit



- **1.** "I.T. Efficiency and Effectiveness are Waning"
- 2. "85% of problems are caused by I.T. changing something"

"Achieving I.T. Governance Through Service Management and Transformation" by Alkesh Patel, IBM Global Technology Services speaking at the IT Governance Summit

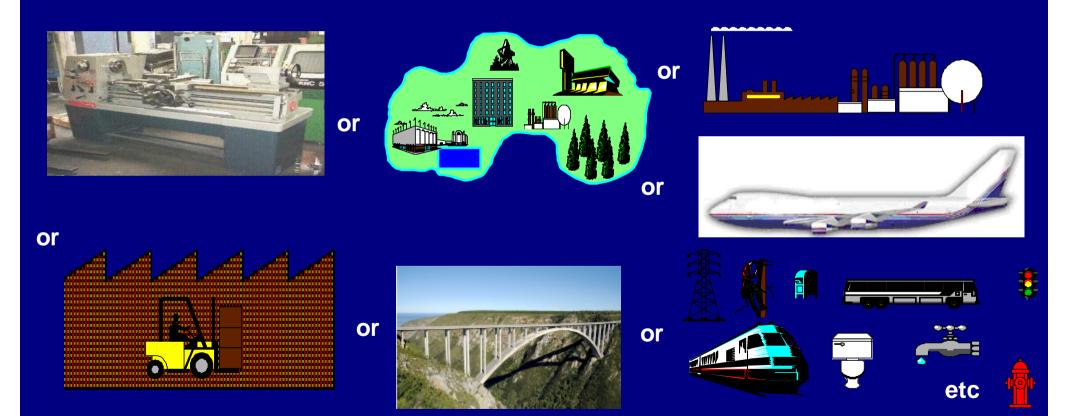
#### **3.** The Strategy Story

- a. Only 10% of organizations execute their strategy
- **b.** Barriers to strategy execution
  - i. Vision Barrier -- Only 5% of the workforce understands the strategy
  - ii. People Barrier -- Only 25% of managers have incentives linked to strategy
  - iii. Management Barrier -- 85% of executive teams spend less than one hour per month discussing strategy
  - iv. Resource Barrier -- 60% of organizations don't link budgets to strategy

"Measuring I.T. Performance by Developing and Applying a Strong, Usable KPI Framework with a Scorecard" by Leon Briel, EBS South Africa speaking at the IT Governance and Strategy Summit, developed from material developed by Robert S Kaplan and Danied P Nolan



SO WHAT WE FIND IS -- What the board thought they were getting (metaphorically):



## CONTEXT: INFORMATION TECHNOLOGY AN INDUSTRY CHARACTERISED BY FAILURE

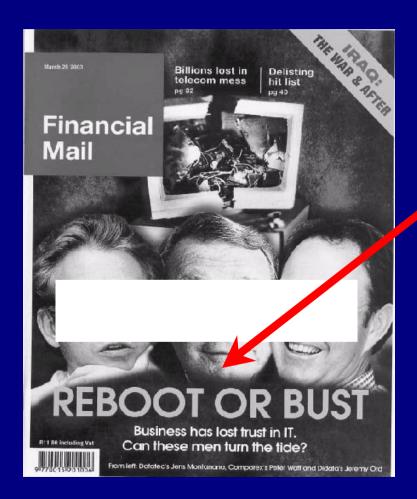


AND -- What the board frequently gets (metaphorically):



## CONTEXT: INFORMATION TECHNOLOGY AN INDUSTRY CHARACTERISED BY FAILURE





*"19 out of 20 E.R.P. Implementations do NOT deliver what was promised"* 

**Duncan McLeod** 

#### CONTEXT ESSENTIAL / CRITICAL QUESTIONS



If one asks the wrong questions one will get the wrong answers

This course is intended to equip you to know which questions to ask

For example:

"is our business getting left behind with regard to I.T?"

OR

"what can we do to deliver greater value from this business?"

and "is there technology that will assist us?"

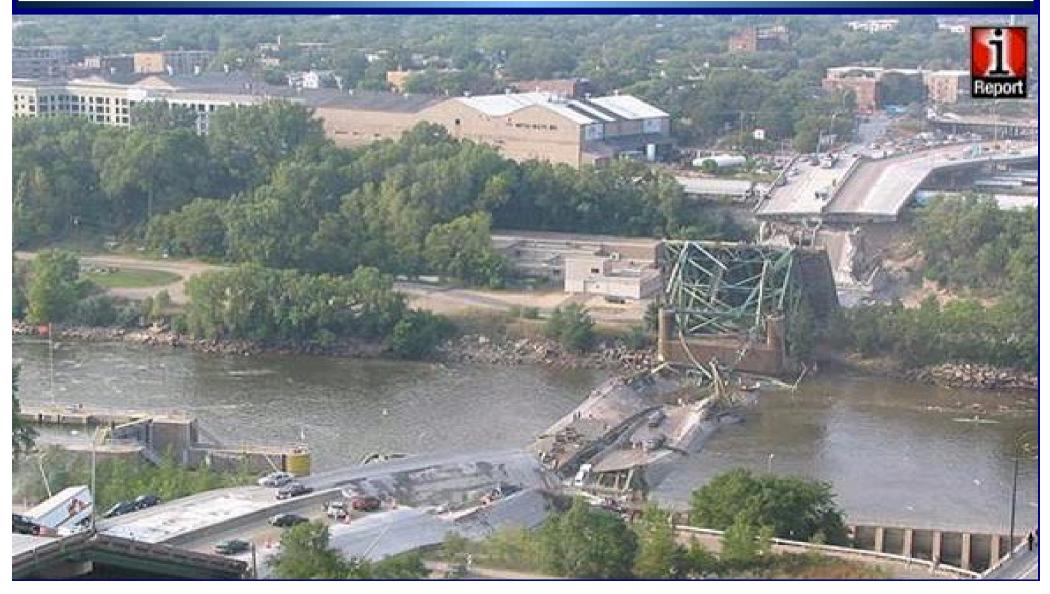
## CONTEXT: INFORMATION TECHNOLOGY AN INDUSTRY CHARACTERISED BY FAILURE

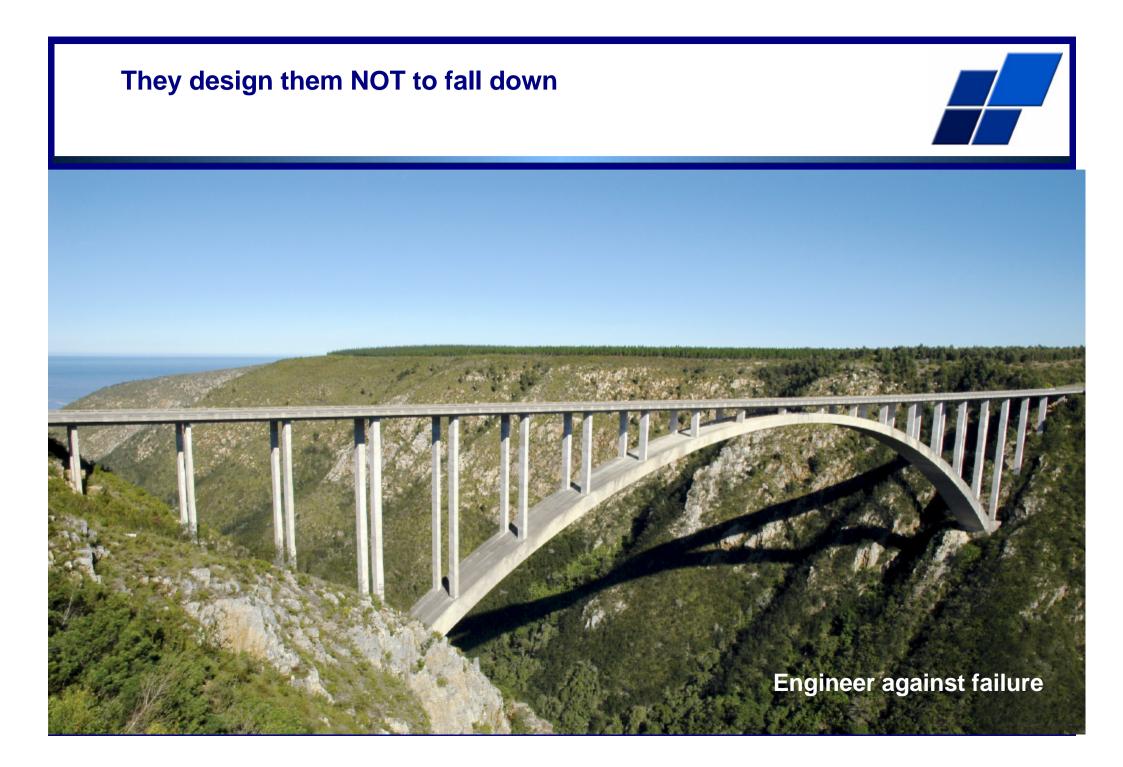
- **1.** Seventy percent of I.T. investments fail TOTALLY
- 2. Another twenty percent fail to fully satisfy the original business requirement
- 3. "19 out of 20 E.R.P. implementations do not deliver "what was promised" McLeod
- 4. Ninety percent of strategic plans fail
- 5. Seventy percent of B.P.R. investments fail
- 6. "Most organisations are not making better decisions than they did five years ago." Gartner



#### Engineers do NOT design bridges to stand up



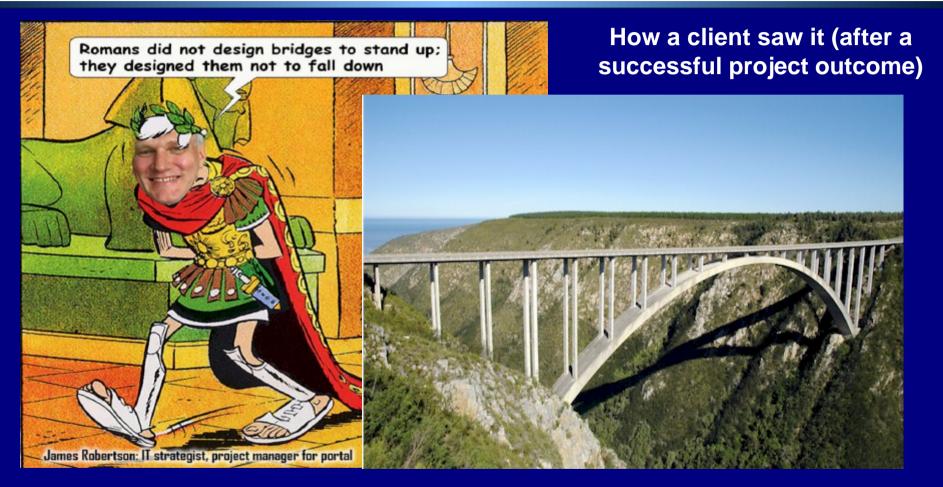




# **A CRITICAL PRINCIPLE FOR SUCCESS**

#### **Engineer Against Failure**





## A CRITICAL PRINCIPLE FOR SUCCESS

#### **Engineer Against Failure**



In order to succeed focus on avoiding failure

Once you have DEFINED SUCCESS then

IF you do NOT fail you WILL SUCCEED



#### COMPLEXITY



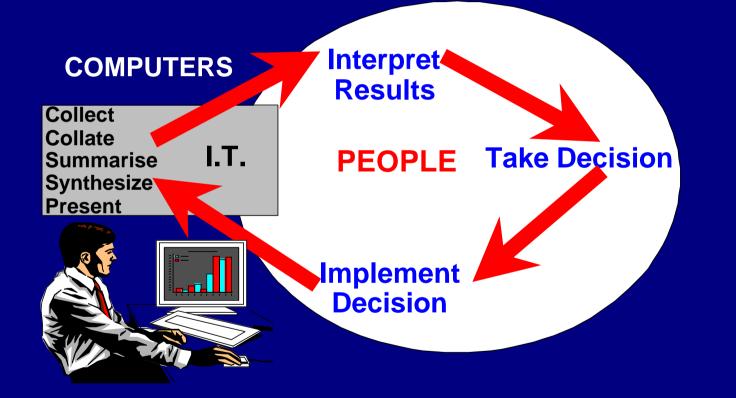
- **1.** Business is extremely complex
- 2. What, why, when, how, etc
- **3.** Simple to use systems accurately model REAL complexity
- 4. Internally "simple" systems that do NOT accurately reflect real complexity are DIFFICULT to use
- 5. Internally "complex" systems that reflect reality are EASY to use

**Optimise system complexity versus ease of use - Be Real** 

## **COMPUTERS versus PEOPLE**



#### The role of computers and the role of people



#### **DATA ENGINEERING**



- The definition of information content
  - in a way that is structurally (taxonomically) fundamentally meaningful to human beings who understand the business
  - and the translation of this content into structured codes which faithfully and accurately reflect human understanding in a way that the computer can manipulate
  - ✓ with minimal human intervention
  - ✓ so that the computer system appears to be intelligent



# **STRATEGY DEFINED**



#### WHAT IS STRATEGY?



#### **STRATEGY DEFINED**



#### Why define strategy?

- **1.** The essence of why a business exists and where it is going
- 2. Vital context to I.T.
- **3.** I.T. failure is primarily a failure of corporate strategic capability

#### **STRATEGY DEFINED**



#### **DOING THE RIGHT THINGS**

Professor Malcolm McDonald , Cranfield School of Management

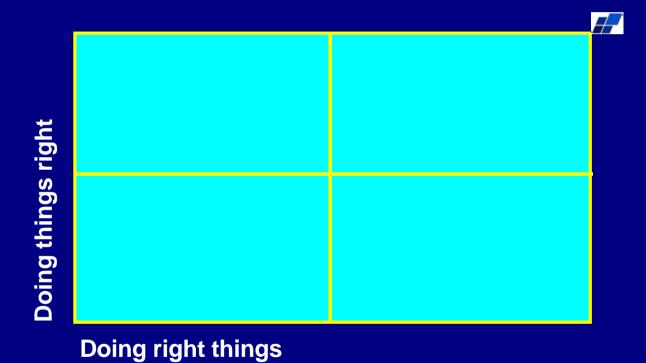
## **TACTICS DEFINED**



#### **DOING THINGS RIGHT**

Professor Malcolm McDonald , Cranfield School of Management



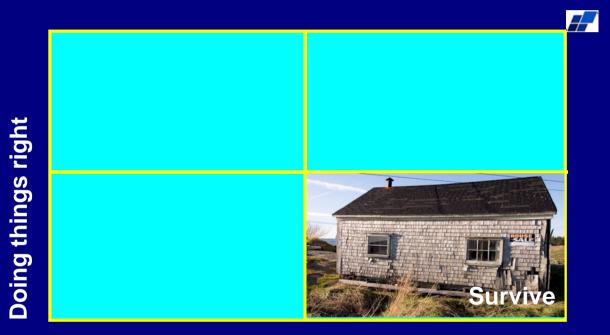


Professor Malcolm McDonald , Cranfield School of Management

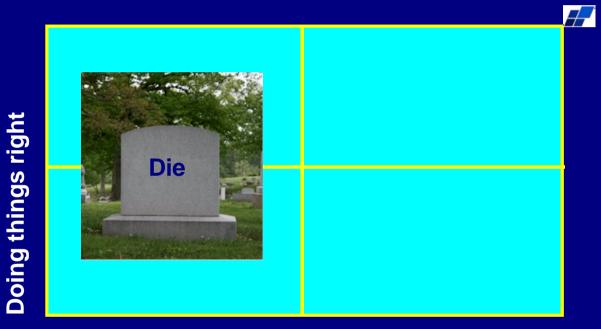




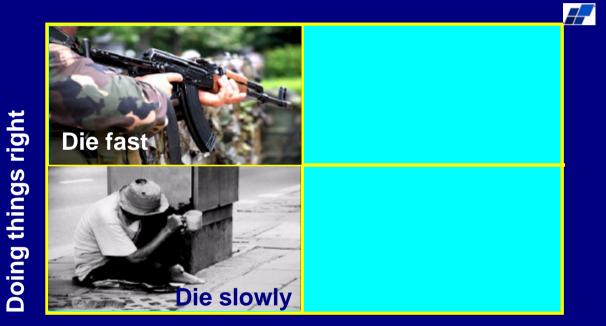
















**Doing right things** 

Professor Malcolm McDonald, Cranfield School of Management

## STRATEGY DEFINED BY PROFESSOR MICHAEL PORTER



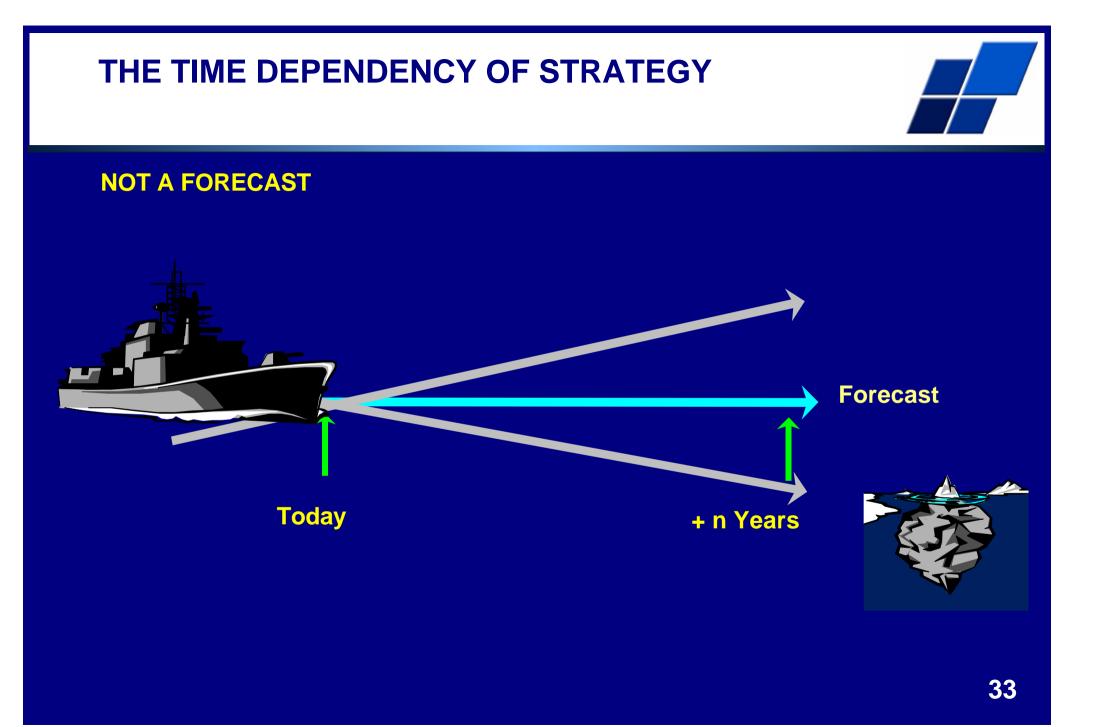
#### WHAT IS STRATEGY?

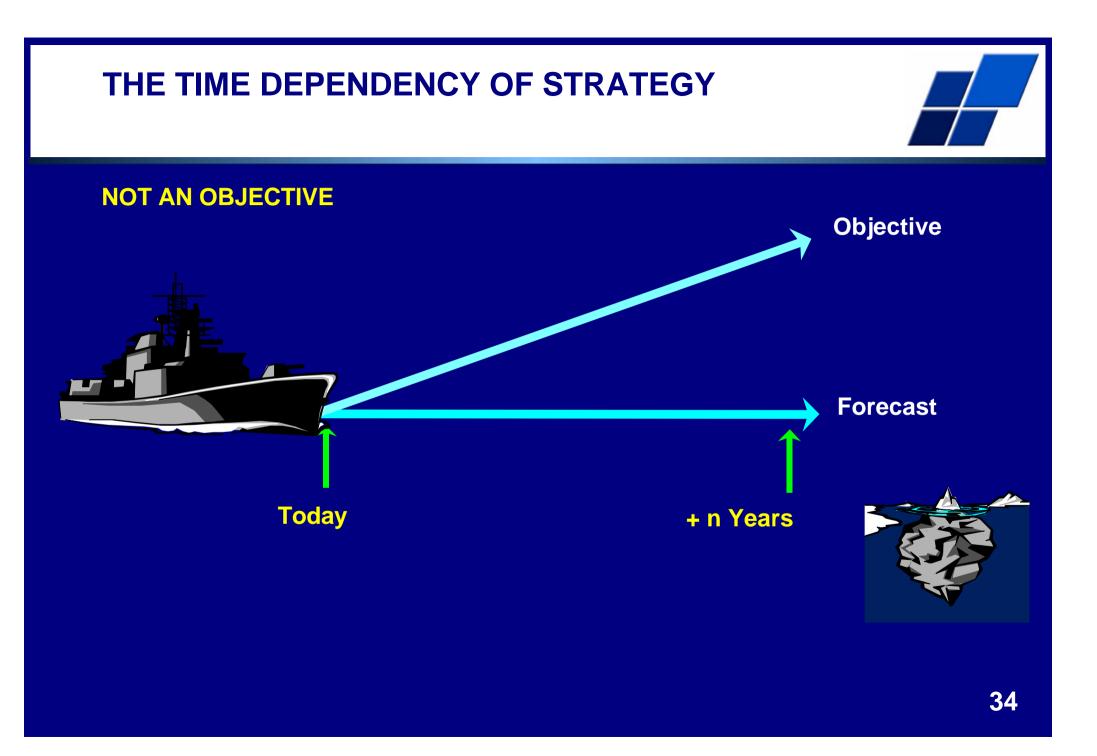
- Strategy is the creation of a unique and valuable position involving a different set of activities

- Strategy is making trade off's in competing, and choosing what not to do

WHAT IS NOT STRATEGY? The Internet or any technology

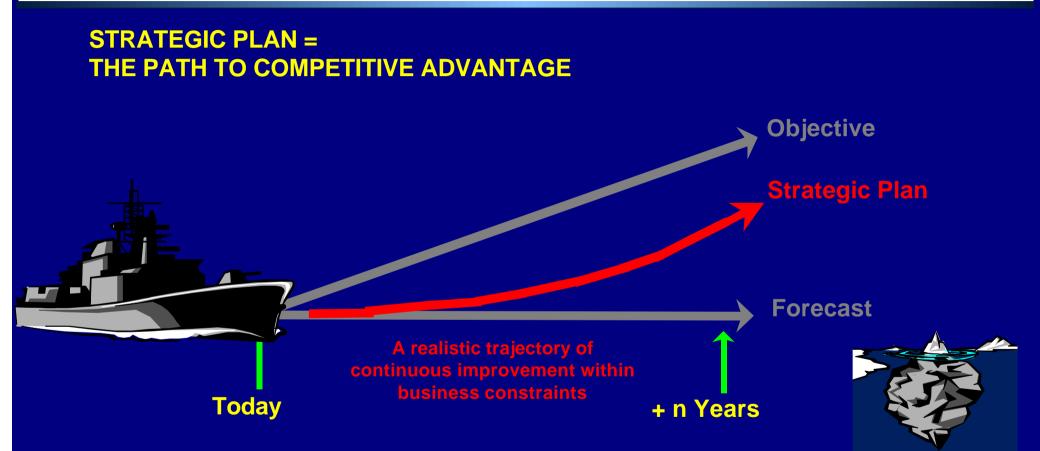
Michael E Porter: Global Competitive Strategy : 9 June 2003





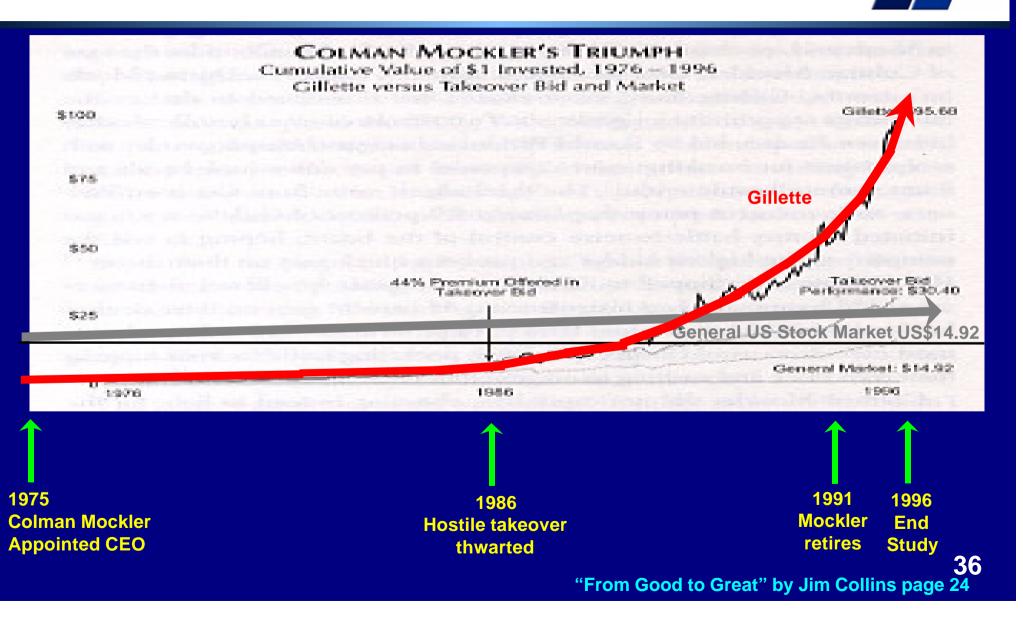
# THE TIME DEPENDENCY OF STRATEGY





Fundamentally an exponential curve or catenary

#### FROM GOOD TO GREAT THE TRAJECTORY OF GOOD TO GREAT

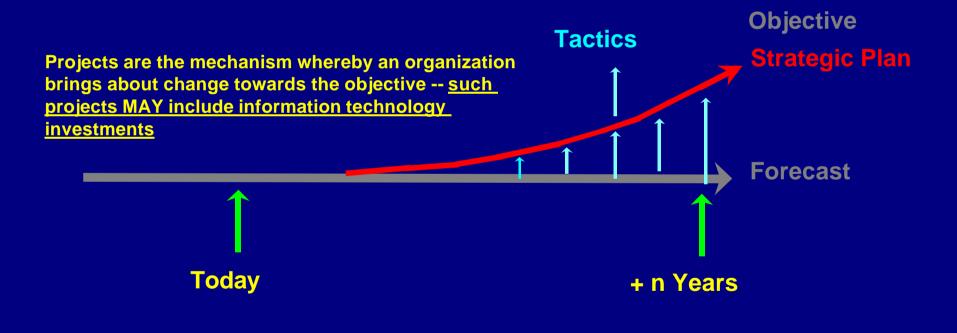


## THE TIME DEPENDENCY OF STRATEGY



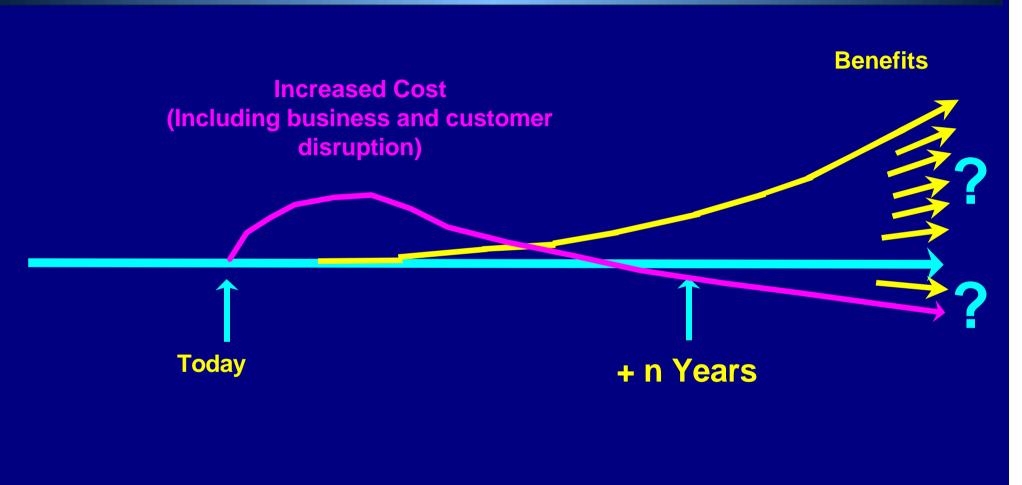
Strategic plans must be future focused

**Design your I.T. solutions for the future - NOT the past** 



## THE TIME DEPENDENCY OF STRATEGY THE REAL COST OF I.T. AND STRATEGY





## THE ESSENCE OF STRATEGY

**Create Competitive Advantage** 



The essence of strategy is integration - the ability to see in a complex holistic way

Michael E Porter: Global Competitive Strategy : 9 June 2003

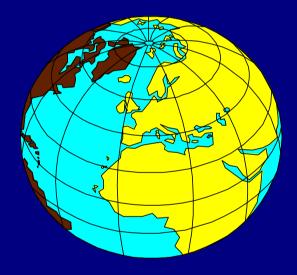
## **THE CORE OBJECTIVE -- DIFFERENTATION**

**Create Competitive Advantage** 



### ECONOMIC TRENDS : HISTORICAL DIFFERENTIATORS

- 60's Production
- 70's Sales
- 80's Finance
- The 90's and 2000's
  - Excess supply
  - Single division cannot solve
  - A boom is unlikely!!
- Strategic Issues are Vital



Implies a Holistic, Integrated Business Approach Including Effective I.T.

## **THE CORE OBJECTIVE -- DIFFERENTATION**

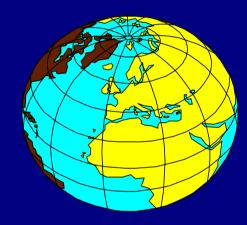
**Create Competitive Advantage** 



### THE KEY DIFFERENTIATORS IN 2000 AND BEYOND

- Market Focused Strategy
- Utilization of the Human Resource
- Effective Management Decision Making

**Requires Information To Make The Right Decisions** 



World Competitiveness Report; McDonald & Others

## VALUE



- **1.** Experienced / defined by people
- 2. Intuitive / gut feel
- **3.** Transaction = exchange of value between recipient and provider
- 4. NOT money / cash / finance

Money = medium of exchange / proxy / surrogate for value

= MEANS OF MEASUREMENT

therefore easy to measure







## **ECONOMIC VALUE**



- **1.** Money is medium of exchange
  - Convert value into money to finance I.T. investment
- **2.** Economic value is essential component of value proposition
  - Derived from other sources of value
- 3. <u>The business</u> must use I.T. as a means to create economic value to finance the I.T. investment

#### Find ways to measure the value that REALLY generates money

This course will examine how value is created and how to determine the value that will generate the economic return to finance an I.T. investment



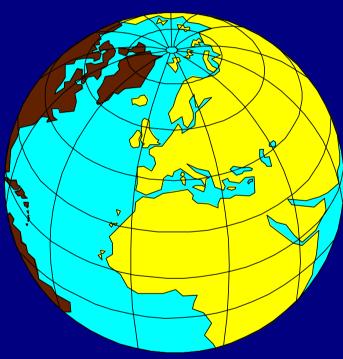
## **THE CORE OBJECTIVE -- DIFFERENTATION**

**Create Competitive Advantage** 

#### THE CHALLENGE FOR BUSINESS

Getting the right information, to the right people, at the right time and in the right place in order to make the <u>right decision!</u>

A major requirement for business information systems





## WHAT IS STRATEGY?



The essence of why an organization exists and how it thrives

## **STRATEGY DEFINED** SO --- WHAT IS STRATEGY?

- **1.** Strategic constants
- **2.** Strategic variables
- 3. Strategic Plan
- 4. What will NOT do
- **5.** NOT
  - NOT Strategems wheeling or dealing or manipulation
  - NOT a way of doing things or a method or a way of running projects or operating a business
  - Should NOT change every year
  - NOT three days at a conference venue once a year

**Core strategy is constant (Porter, Robert)** 





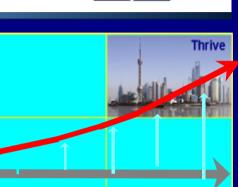


## **STRATEGY DEFINED** SO --- WHAT IS STRATEGY?

### **5.** STRATEGY IS

- Multifaceted, complex, abstract, holistic
- Requires cognitive thinking to define, describe and translate into action
- Describes the essence of the market forces that impact the business and how the business interacts with the market in order to succeed and plans to interact with the market in the future
- Strategy impacts every facet of the organisation

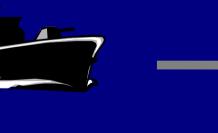
Every organisation has markets, whether they pay for products with money or with votes or something else

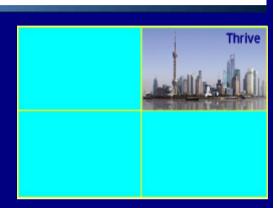


## **STRATEGIC ALIGNMENT**

- 1. If you don't know where you are going, any road will get you there!
- 2. Strategic alignment is about defining where the business wants to go and then aligning all activities to support the business to reach that destination

#### Strategic alignment of information technology is absolutely vital







## CRITICAL FACTORS CONTEXT AND DEFINITIONS



CONCLUSION

These factors are essential to understanding the business context of I.T. in order for I.T. investments to succeed

## **CRITICAL FACTORS**



**World Class Business Information Systems** 

## WORLD CLASS BUSINESS INFORMATION SYSTEMS



- **1.** Critical attributes / components of world class systems
- **2.** Example of relative business importance of critical components
- **3.** Example of relative cost of critical components
- 4. Estimated benefits of a well implemented solution resulting in world class capability
- **5.** Scenarios for achieving world class capability

# EXAMPLE OF RELATIVE BUSINESS IMPORTANCE OF CRITICAL COMPONENTS

- **1.** Appropriate fully integrated systems at data level (1%)
- **2.** High system operational efficiency and precision (2%)
- **3.** Integrated, holistic business operations (3%)
- **4.** Comprehensive data engineering (4%)
- 5. Strategic alignment of all operational systems (5%)
- 6. Comprehensive management information with full drill-down (6%)
- 7. Comprehensive strategic analysis and decision support capability (79%)

# EXAMPLE OF RELATIVE COST OF CRITICAL COMPONENTS



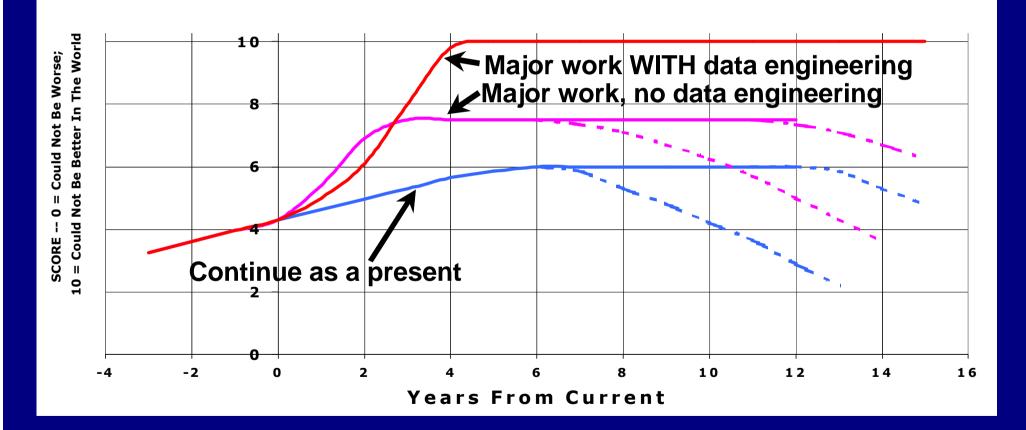
- **1.** Comprehensive data engineering (15%)
- **2.** Appropriate fully integrated systems at data level (25%)
- **3.** High system operational efficiency and precision (30%)
- 4. Strategic alignment of all operational systems (5%)
- 5. Integrated, holistic business operations (5%)
- 6. Comprehensive management information with full drill-down (15%)
- 7. Comprehensive strategic analysis and decision support capability (5%)

# ESTIMATED BENEFITS OF A WELL IMPLEMENTED SOLUTION



- **1.** Improved Corporate Competitiveness (40%)
- 2. Improved Corporate Profitability, Bonuses, Stock Options, Share Value, Dividends, etc (30%)
- **3.** Effective Corporate Operation, Sustainability, Better Decisions (20%)
- 4. Improved Personal and Corporate Relationships For Executives, Management And Team Members (4%)
- 5. Improved Health, Quality Of Work Life and Family Life For Executives, Management, Team Members and Staff (3%)
- 6. Recognition, Differentiation and Promotion For Executives, Management And Team Members (2%)
- 7. Empowerment, Improved Remuneration, Job Security and Life Style For Executives, Management and Team Members (1%)

## EXAMPLE SCENARIOS FOR ACHIEVING WORLD CLASS CAPABILITY



## EXAMPLE SCENARIOS FOR ACHIEVING WORLD CLASS CAPABILITY



- **1.** There can be significant constraints
- 2. These need to be understood
- **3.** Remediating the critical factors will give rise to substantial cost benefit compared with remediating the non critical factors

## WORLD CLASS BUSINESS INFORMATION SYSTEMS



Systematic analysis and understanding of these issues and principles is vital to delivering a world class solution

Without these factors a solution can be technically world class but from the perspective of the business it may be viewed as second rate

## CRITICAL FACTORS IN I.T. INVESTMENT SUCCESS CONTEXT AND DEFINITIONS

## **QUESTIONS?**



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Please remember the evaluation forms