Understanding IT Strategy

What is strategy?

- "Strategy is the *direction* and *scope* of an organisation over the *long term*: which achieves *advantage* for the organisation through its configuration of resources within a changing *environment*, to meet the needs of *markets* and to fulfil *stakeholder* expectations."

- Source: Johnson and Scholes, 1999, p 10

Resource Based View Vs Position View of Strategy

- Resource Based View
  - Think of rugby or a football team that has one star player and how they play the game; their game plan is that, the star player is given the ball by the other players and then they do what they do best and win games
- Position View
  - Think of a local high end street and see which 'shop' has the prime location and notice how often say travel agents are all 'bunched together'

    around the prime spot to entice customers in using their services

Understanding IT Strategy

- Literature using IT/IS Strategy construct
  - IT strategy as the use of IT to support business strategy
  - IT strategy as the master plan of the IT function
  - IT strategy as the shared view of the IT role within the organization

Understanding IT Strategy

- IT strategy is a comprehensive plan that IT management professionals use to guide their organizations
- An IT strategy should cover all facets of technology management, including cost management, vendor management, risk management & all other considerations in the IT enterprise environment

Understanding IT Strategy

- Executing an IT strategy requires strong IT leadership; the CIO & CTO need to work closely with business budget & legal departments as well as with other user groups within the organization

Understanding IT Strategy

- Understanding the strategy of the organization is a must for developing an effective IT strategy.
- If the IT strategy does not fit with the overall organization's vision, there will be constant conflict.
- Need to articulate organizational vision and determine how IT will help with meeting and sustaining that vision.

Developing an IT Strategy in uncertain world

When is the right time to produce an IT strategy?

- In terms of when to think about all this, there is no particular right or wrong time
- – though there are circumstances which make it easier and more likely that the outcome will be successful.

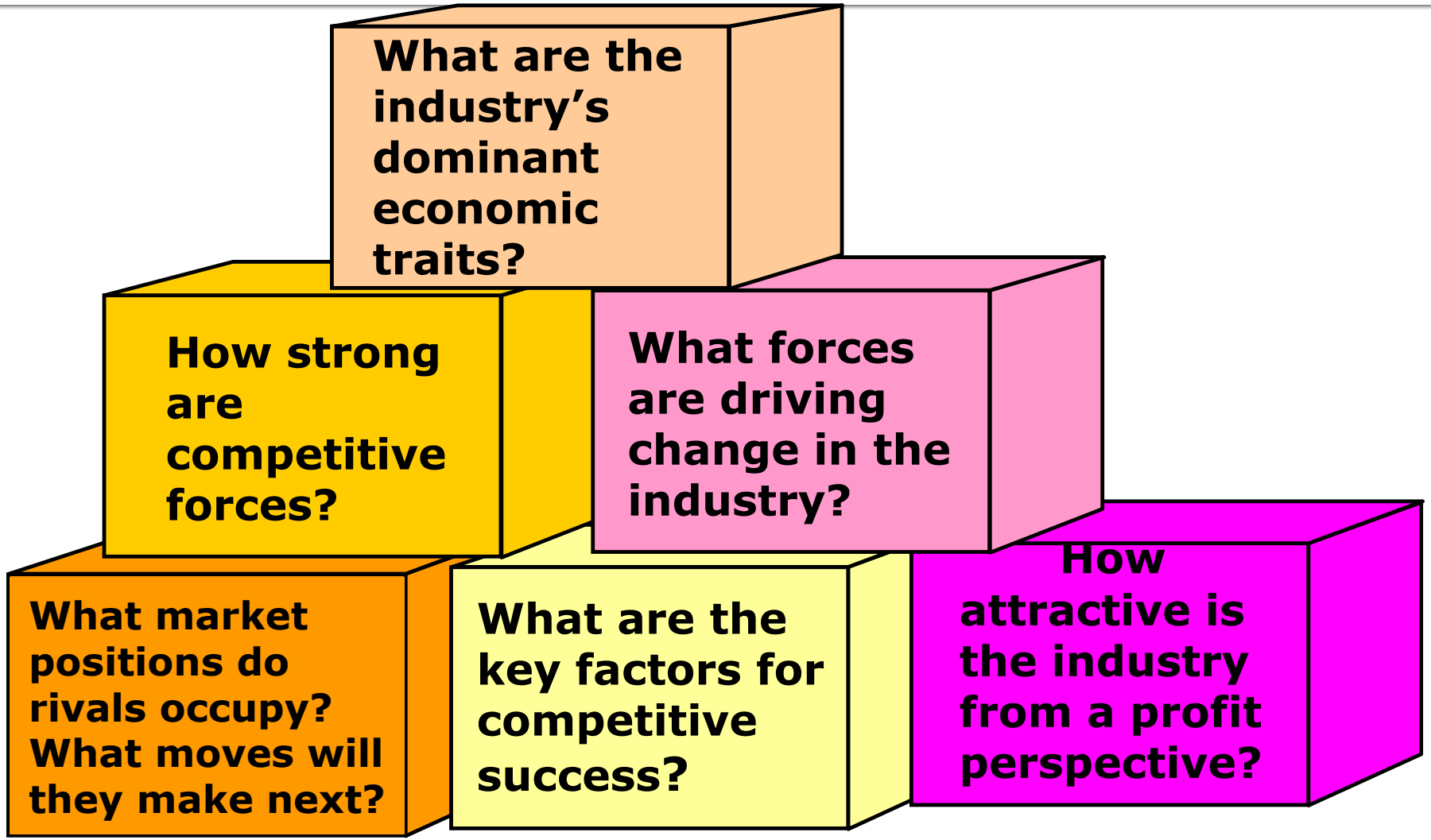
When is the right time to produce an IT strategy?

- Generally, producing an IT strategy is more straightforward if:
  - your corporate strategy and priorities are already clear and understood by the managers, staff and other stakeholders who will need to take part;
  - the stakeholders who need to be involved will have time to focus on the IT strategy and will not be significantly distracted by other projects or programmes of work going on at the same time;
  - the senior managers in your organization are supportive and will actively encourage staff and colleagues to take part as necessary

Developing an IT Strategy

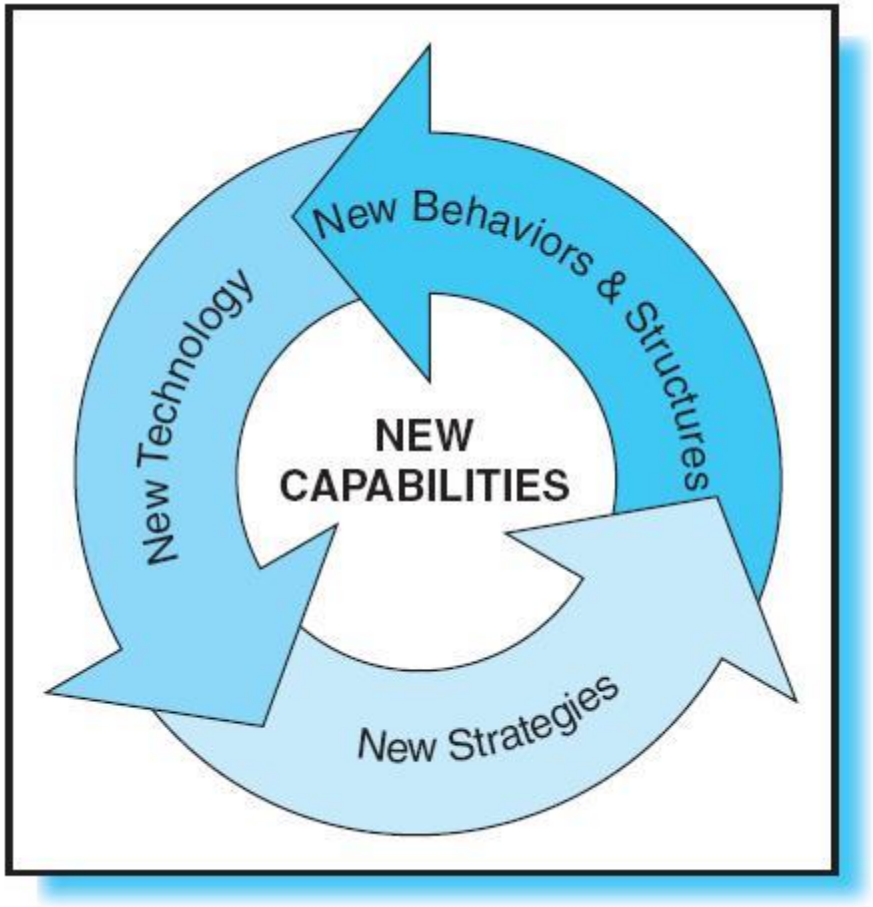
- The IT strategy must be integrated not only in terms of information, systems and technology via a coherent set of actions but also in terms of a process of adaptation to meet the changing needs of the business as they evolve.

Developing an IT Strategy



The Importance of IT

- New technologies co-evolve with new business strategies and changes to the business environment.
- IT and business strategies must be complimentary.



Business and IT Strategies

- *Historical View* – IT strategy should support the business strategy.
- IT's contribution was inhibited by a limited understanding of the business strategy.
- IT's contribution was inhibited by a limited understanding of IT's potential by the business managers.

Business and IT Strategies (continued)

- *Current View* – IT strategy should be integrated with the business strategy.
- IT must be positioned for flexibility, speed and innovation to support rapidly changing business environment.
- Technology investments should compliment business strategy.

Business and IT Strategies (continued)

- *Future View* – IT strategy must become more dynamic and focus on developing strategic capabilities that support a variety of changing business objectives.
- IT and business alignment will not be point-in-time planning; it will support evolutionary change.

Four Critical Success Factors

1. Revisit your business model.
2. Have strategic themes.
3. Get the right people involved.
4. Work in partnership with the business.

Revisit Your Business Model

- A business model explains how the different pieces of the business fit together.
- The business model should be clear and describe the unique value that the organization can deliver.

Have Strategic Themes

- IT strategy is about carefully crafted programs that focus on developing specific business capabilities.
- IT and business programs that are grouped in strategic themes are easier to track and support interdependencies.

Get the Right People Involved

- Senior management should take an active role in IT decision making.
- Key stakeholders should be involved in determining technology opportunities.

Work in Partnership with the Business

- Business and IT must both have input into the strategy.
- IT projects should be synchronized with business objectives.

Dimensions of IT Strategy

- ***Business Improvement*** – stress relatively low-risk investments with short- to medium-term payback. Focus is on streamlining business processes.

Dimensions of IT Strategy (continued)

- ***Business Enabling*** – transforms or extends how a company does business.

  --Typically focused on revenue growth.

Dimensions of IT Strategy (continued)

- ***Business Opportunities*** – small-scale experimental initiatives designed to test the viability of new concepts or technologies. High risk projects that typically may not have well-defined, expected returns. These typically have a much lower success rate so funding is sometimes difficult to obtain.

Dimensions of IT Strategy (continued)

- ***Opportunity Leverage*** – leverages successful experiments or prototypes. Technology is easy to imitate; some initiatives may leverage the results of other companies.

Dimensions of IT Strategy (continued)

- ***Infrastructure*** – Operating level hardware and software must be maintained. Typically not well understood by business managers.

IT Strategy Development Best Practices

- ***Rolling* Planning and Budget Cycles** – plans and budgets should be updated more than once per year.

- **An Enterprise Architecture** – consisting of an integrated business and IT blueprint. It should assist in identifying duplicate solutions.

IT Strategy Development Best Practices (continued)

- **Different Funding *Buckets*** – allocate funding for all types of IT projects.
- **Account or Relationship Managers** – IT account managers to identify synergies and interdependencies among lines of business and opportunities for technology to improve the business.

IT Strategy Development Best Practices (continued)

- **A Prioritization Rubric** – Adopt multiple approaches to justify project funding decisions to account for the differences in return on IT investment.

Understanding SMEs & Large firms

- Understand the uniqueness of SMEs
- Understand the uniqueness of large firms

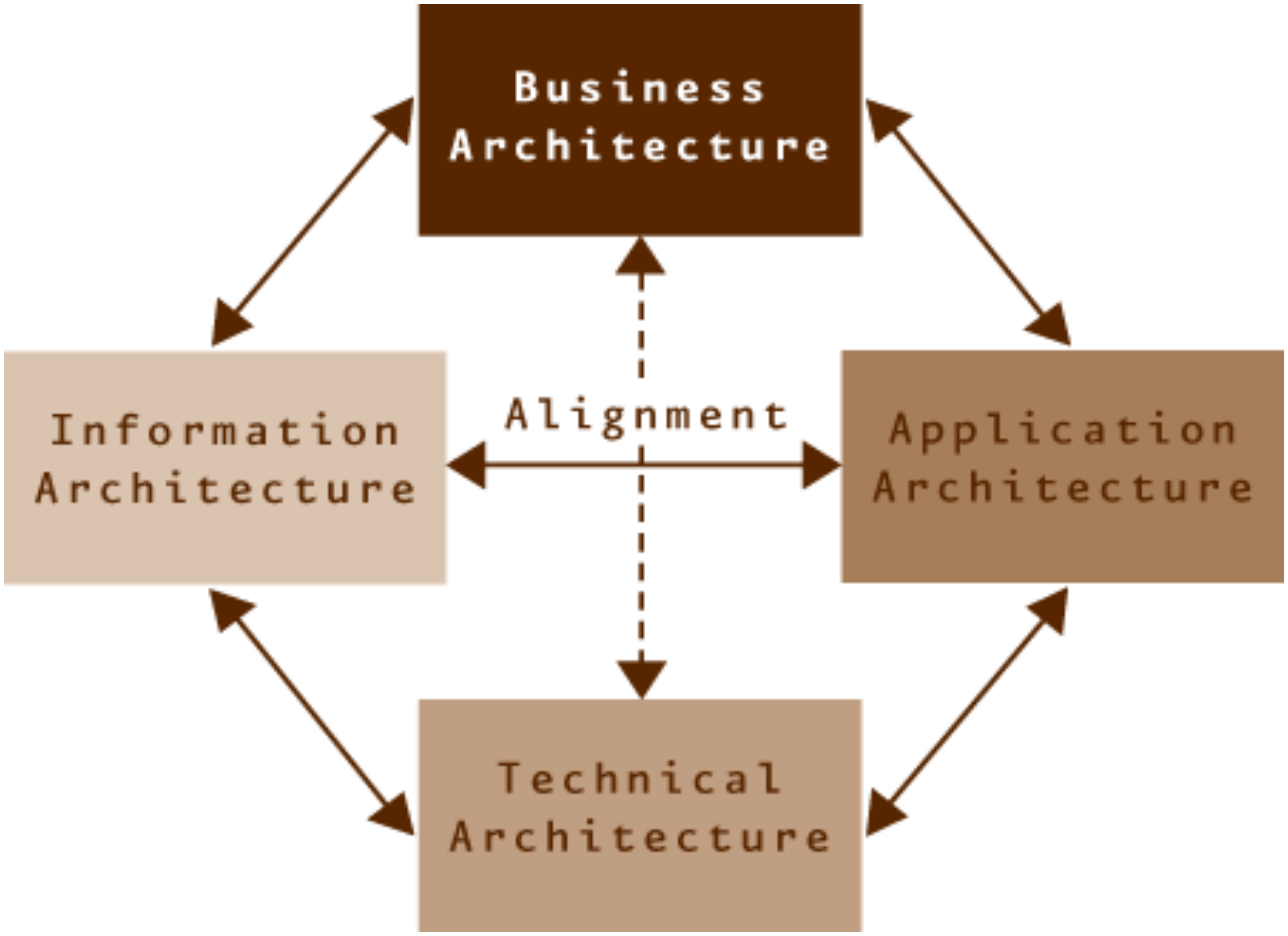
Enterprise Architecture Framework

- The alignment between Business Processes (BP) and IT is a major issue in most organizations, as it directly impacts on the organization's agility and flexibility to change according to business needs.
- The concepts upon which alignment is perceived are addressed in what is called today the "Enterprise Architecture", gathering business and IT together.
- Many Enterprise Architecture Frameworks have been proposed, focusing on different concerns and with different approaches for guiding the development of an IT infrastructure well suited for the organization.

Enterprise Architecture

- Describes the four fundamental components of enterprise:
  - Business architecture
  - Information architecture
  - Application architecture, and
  - Technical architecture
- Based on MEA

Enterprise Architecture



Enterprise Architecture

- **Business Architecture:**
- The business architecture is the result of defining business strategies, processes, and functional requirements.
- It is the base for identifying the requirements for the information systems that support business activities.

Enterprise Architecture

- **Business Architecture:**
- Typically includes:
- The enterprise's high-level objectives and goals
- The business processes carried out by the enterprise as a whole, or at least in significant part
- The business functions performed
- Major organizational structures
- The relationships among these elements

Enterprise Architecture

- **Information Architecture:**
- The information architecture describes what the organization needs to know to run its processes and operations, as described in the business architecture.
- It provides a view of the business information independent of the IT view of databases.

Enterprise Architecture

- **Information Architecture:**
- In the information architecture, business information is structured in "information entities," each having a business responsible for its management and performing operations such as acquisition, classification, quality control, presentation, distribution, assessment, and so on.

Enterprise Architecture

- **Application Architecture:**
- The application architecture describes the applications required to fulfill two major goals:
- 1. Support the business requirements
- 2. Allow efficient management of information entities

Enterprise Architecture

- **Application Architecture:**
- Application architecture is normally derived from the analyses of both business and information architectures and typically includes:
  - Descriptions of automated services that support the business processes
  - Descriptions of the interaction and interdependencies (interfaces) of the organization's application systems

Enterprise Architecture

- **Application Architecture cont..:**
  - Plans for developing new applications and revision of old applications based on the enterprise's objectives, goals, and evolving technology platforms
- Applications also have required attributes, such as availability (up time), scalability (ability to alter capacity and function to meet future needs), and profile-based access (ability to identify who does each task).

Enterprise Architecture

- **Technical Architecture:**
- Description of infrastructure and system components that are necessary to support the application and information perspectives.
- It defines the set of technology standards and services needed to execute the business mission.

The Process

- Document What We Want
  - Document the firm's business strategy
- Document What We Have
  - Assess the firm's current IT capabilities
- Document How to Get Where We Want to Go
  - Gap analysis, identify options, prioritize projects

Documenting the Business Strategy

- Research and review the firm's business plan
  - Expansion, contraction, merger plans
  - Office relocations, expiring leases
  - New client markets
  - New services to existing clients

Documenting the Business Strategy

- Methods for gathering information
  - Written business plans
  - One on one meetings
    - Firm leaders, Managing partner, Executive director, Members of technology committee
- Identify firm and customers expectations
  - Are there customer expectations that we cannot currently meet?
  - Can our competitors offer services that we can't?

ASSESS CURRENT CAPABILITIES

- Document existing IT infrastructure
  - Hardware and Software Architecture
  - Business continuity plan
  - Knowledge management
  - Technology policies
    - Acceptable Use, Email, Electronic Document Retention, Internet usage and monitoring
    - Laptops, Home PCs, PDAs, Blackberry, Cell Phone (BYOD)
  - IT Staffing Resources
    - Org Chart
    - Knowledge Levels

ASSESS CURRENT CAPABILITIES

- Overview of all projects in process
  - What they are
  - What they accomplish
  - Timelines for implementation
- Customer satisfaction
  - Conduct internal and external survey to gauge services provided compared with firm's and customer's expectations

BENCHMARKING FIRM TECHNOLOGY

- What would we like to do that we can't do now?
  - Outline new environment based on business strategy research
  - Identify technology opportunities - "Watch List" technologies
    - Portals
    - XML
    - Wireless networking
    - Unified messaging, VoIP
  - Where will we be tomorrow?

BENCHMARKING FIRM TECHNOLOGY

- What do other firms have?
- What do our customers have?

BENCHMARKING FIRM TECHNOLOGY

- Compare the firm's current technology with business needs and industry surveys and research
  - Plot the gaps between current technology, business needs, and industry standards
  - Large gaps will likely become focal points for technology plan

GAP ANALYSIS

- Where is the firm ahead of the curve, behind the curve, or not on the map?
  - Industry technology
  - Business process
  - Infrastructure
  - IT Staffing and skill sets
- Which of these gaps impact business strategy?

BRIDGING THE GAP

- Propose new IT environment
- Prioritize projects based on gap analysis
  - Industry technology
  - Business process
  - Infrastructure
  - IT Staffing and skill sets

BRIDGING THE GAP

- Associate business goals with each project
- Identify options for implementing each project
  - Hardware
  - Software
  - Consulting
  - Training
  - Costs
  - Time
- Develop High-Level Timeline based on prioritization

PUTTING IT TOGETHER

- Assemble all pieces of the plan
  - Business Strategy
  - Firm's Requirements
  - Current IT Environment
  - Benchmarks and Gap Analysis
  - Proposed Environment
- Summarize each section for a non-technical audience

PUTTING IT TOGETHER

- Develop Executive Summary
  - Objectives of Strategic Technology Plan
  - How information was collected
  - Summary of findings
    - Where the firm is leading
    - Where the firm is keeping up
    - Where the firm is behind
  - Summary of Recommendations
    - Apply recommendations to firm business strategies
  - **This may be the only section of the plan that is actually read**

Barriers to Effective IT Strategy Development

- A governance structure for enterpisewide projects
- Enterprisewide funding models
- Parallel and linked resources for developing IT and business strategies
- Traditional budget cycles

Barriers to Effective IT Strategy Development (continued)

- Balancing strategic (what) and tactical (how) initiatives
- Skills in strategizing

Conclusion

- IT strategy is gaining attention by businesses.
- Most organizations are still at the early stages of integrating IT strategy with business strategy.
- Balancing IT solutions with business strategy will position organizations to respond to rapidly changing business environments.