Rethinking Project Management

Management of Projects

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1. Introduction

Traditionally project management had been the realm of the construction and engineering industries in the 1950's and 1960's, where the project manager had evolved from functional manager. Communication was minimal or informal due to the amicable relationships that existed between line-managers and other project stakeholders Kerzner (2003).
In stark contrast today's project manager needs to be *hands-off,* concerned with business strategy and his most important trait maybe that of communication and personality.

- What has changed?
- why are Project Managers now getting involved with business matters?
- and why is the project manager so friendly with the customer?

Chapter 2 *Modern Project management* looks at the evolution of project management and the requirement of change to the project managers remit. Major events in the twentieth century are identified as possible reasons for the impetus for change in the delivery of projects and the change in priorities and responsibilities of the project manager is identified.

In chapter three *Organisational Strategy and project selection,* looks to explain how and why projects are chosen and explains how each must delivery more to the organisation than mere profit in monetary terms. Additionally, contradiction in the remit of the project manager is examined with a look at the delivery of strategic projects which require both *soft-skills* and *front-end* knowledge.

Organisation Structure and Culture: chapter four, looks at a comparison of the traditional organisational structures and other options with which to facilitate the undertaking of projects is a more controlled and resource fiscal way. Culture is also examined in order to describe the need for the continuing need for change throughout the business, specifically the project team and project manager.

Chapter five: *Managing Risk* looks at why errors and risks may still be rampant in projects and discusses both external and internal risks with a view to highlighting areas where improvement is still achievable.

Leadership: section six, describes how the project manager can avert the adversarial relationships which are commonplace between project stakeholders and their enterprises and describes how the project manager role can continue to evolve through focus on the macro environment.

Managing Project Teams is covered in chapter seven. The question: what has changed continues to be answered with a look at why team work is necessary, how it can become more fruitful and the increasing need for project team members with interpersonal skills, appreciation of cultural differences and the ability to communicate effectively. Lastly a cautionary overview of the negative aspects that the current litigation-prone business society may have on the project; with regards to removal of team members when issues occur and their services are not in line with requirements.

2. Modern project management

Modern project management began in the 1950's in response to problems with over-the-fence management style of project delivery, became less acceptable to customers, who wanted to interface with a single point of contact and responsibility Kerzner (2003).

However it was not until the late 1960's and early 1970's that Project Management Associations emerged, providing a home for those responsible actors wanting to formalise their diverse project undertakings (Morris 2006). The bodies also provided a means to peer-review and share project information, in order to provide a greater level of understanding, control and competence. One of the many positive outcomes of this need was the uptake of project management by other more diverse business sectors as the implementation method of choice, providing greater control of projects with regards to timescale, cost and quality.

Since, the 1980's their have been further, major changes effecting project management; examples are:

- National and international politics and conflict (e.g. War and Terrorism)
- Crisis requiring international aid and funding organisations (e.g. tsunami, hurricane; NATO, World Bank, Global warming, Oil, Nuclear Power)
- Legislation and regulation (e.g. consumer rights, building regulations)
- Quality control and Health & Safety (e.g. ISO 9000)
- Globalisation and corporate down sizing (e.g. increased competition, market entry pricing; partnering, alliances)
- National Government initiatives (e.g. Privatisation , Project Finance Initiative)
- Buying habits (e.g. Credit-cards, WWW, late-night/seven day shopping)
- Technological advancement (e.g. PC's and Mobile phones, time to market, cost reductions)
- Social changes (e.g. consumerism, *throw-away* society; taboos, political correctness)
- Project failures (Concorde, Space Shuttles missions *Challenger* and *Columbia*, Scottish parliament, Portcullis house, Wembley stadium, Channel Tunnel)
- Project success (Apollo 11, Dartford Bridge, Humber Bridge, Sydney Opera House)

The above listing is by no means exhaustive, however, each has undeniably had a role to play in the way that projects are carried out and perceived by its critics.

Whether the above referenced projects are perceived as a success or failure by its critics is something that Shenhar (2001) discusses extensively, as he proffered that project success is a *multi-dimensional* concept and that its success factors are subjective, requiring that acceptance/precipitance criterion is given substantial consideration before initiation and not just during or after performance.
One of the more recent developments of project management is the use of projects to bring about increasingly diverse and non-physical deliverables – for example as social

change, movie production, design, research and development (R & D) etc. There are many reasons for this modern day uptake in the use of projects as a vehicle; one of which described by Laszlo (1991) is Globalisation. Laszlo explains businesses have been 'decentralised and outgrown traditional modes of organisation, in search of profits and competitive advantage as enterprises became international, then multinational, and then global'.

As a result a typical project would now have more players involved, each requiring their own personalised subset of project related information. This demand requires that the project manager interface with these project stakeholders (e.g. clients, Banks and other lending agencies, Governments officials, end-users, professional bodies and authorities) for each of the related project tasks; requiring effective presentation/communication skills and business intelligence in addition to the traditional technical (hard) skills with which to enable sufficient communication with the project delivery team members.

A comparison of the current-day project manager with that of the traditional, technical and hands-on project manager; demonstrates that this change is drastic. Modern project management is more in line with nurturing of the project undertakings and the people involved to meet its deliverables; where as previously the project manager would be tasked with *getting the job done.*

Shenhar (2001) suggests that today's dynamic business environment requires taking a strategic approach to project management. Project management principles that include only meeting specifications and providing on-time delivery within estimated costs will not be sufficient in the twenty-first century. Thus, the project manager's role has evolved to that of a facilitator and communicator with skills more in-line with current responsibility and people skills or *soft-skills.*

3. Organisational Strategy and project selection

Beware lest you lose the substance by grasping at the shadow.

Aesop (620 BC - 560 BC)

3.1 Introduction

A continuous focus on the organisational business strategy is of paramount importance if project managers are to realise project undertakings in line with the current needs of the business and become true advocates of the future success of the organisation.

3.2 The Strategic Management Process

The reason why Strategic Management is referred to as a *process* is its cyclic nature; thus, there is a need to continually review strategic objectives due to the ever changing business environment. The purpose of strategy is to make a business fit into its environment and by achieving this; probability that it will survive and prosper will be enhanced.

Gray (2006) identifies a typical strategic management process as having four stages:

1. Review and define the organizations mission: this defines *what we want to become.* In order to contribute to the realisation of goals and make project decisions in an informed and focused manner; all parties within the business organisation should be aware of the importance of the strategy and the purpose for the organisations unique requirements therein.

   Example mission statements are:

   > *To develop and promote the professional disciplines of project and programme management for the public benefit.*
   >
   > Association for Project Management (2006)
   >
   > *To deliver exceptional value through customer-focused radical solutions to create, manage and invest in property and infrastructure assets.*
   >
   > Laing O'Rourke plc (2006)

2. Set long-range goals and objectives – this is the *where* the enterprise is headed and *when* it is going to get there. This is a 'layman's' translation of the underlying objectives from the mission statement into specific, measurable, assignable, realistic and time related terms.

3. Analyze and formulate strategies to reach objectives – *what* needs to be done to reach objectives.
4. Implement strategies through projects – the *how* strategies will be realised.

3.3 Portfolio management system

A portfolio management system is essentially a facility to enable governance of project selection with a view to achieving maximum benefit via strategic resource usage. This facility is traditionally a bespoke solution; however, the acronym PPM for 'project portfolio management' is firmly established as referring to a software package that enables business users to organise a series of projects into a single portfolio; in order to facilitate business strategy.

Gray (2006) advises that a portfolio management system helps to reduce the three main problems associated with project selection. These are:

1. The 'implementation gap': this results from un-collaborated decisions by senior management of which projects best meet business strategy needs. Common side-effect of the inadequate project prioritising associated with this, are conflicts between functional departments, as they attempt to prioritise the projects and argue over restricted resources with which top implement the undertakings.
2. Organisational politics: this occurs where an illogical prioritisation is given to a 'pet project' due to political pressure from a high ranking advocate. Here 'sacred cow' projects may be undertaken against any formal strategy in order to appease the advocate; stealing resources from valid projects and causing much frustration in its wake.
3. Resource conflicts and multitasking: this can occur where resources are not taken into account when prioritising projects. The situation is exasperated where projects are of a specialist nature and key resources are spread too thinly to properly commit to the undertaking.

Utilisation of a portfolio management system will alleviate the above problems by providing transparency of project selection and ranking criterion; serving to highlight any misguided prioritisation of 'sacred cow' projects and also providing organisation wide, persistently updated priority status of projects as well as status of current undertakings and resource utilisation.

In addition, the system should facilitate for the:

- Classification of a project: these are generally compliance (*must do*), operational or strategic.
- Selection criteria dependent of classification: either financial (e.g. NPV, IRR or Payback period) or non-financial (e.g. increase market share or develop core technology).
- Sources of proposals: opportunities should be encouraged from all sources regardless of department, seniority or nature of employee.
- Evaluating of proposals: *must* and *want* objectives as decided by senior management, dictated by strategy focus and balance of resources per classified project type.
- Managing the portfolio of projects: generally performed by the project team or a dedicated priority team in large organisations.

3.4 Projects as a vehicle to implement strategic change projects: an oxymoron?

As previously described, projects are increasingly used as a vehicle to implement a myriad of project outcomes; including that of *strategic change* projects. However, this seems to be inappropriate given that the Project Management Institute's PMBOK® does not deem strategic aspects, or *front-end* responsibility, to be in the remit of the project manager.

According to Morris et al (2006) in his reflection of research by the *rethinking project management* group:

> The *PMBOK® Guide* reflects a strong execution orientation, having hardly any material on strategy and project definition, the management of external factors, or human behaviours [referring to *front-end* responsibility]. The PMBOK view of the discipline has become extremely pervasive, so much so that many people in many organisations do not see project management as the discipline to deal with the establishment of these targets.

He continues:

> The way the project front-end is managed has a disproportionately large influence on the project outcome. Should project management as a discipline cover the management of the front-end or is it limited to the execution phases, as PMBOK and many organisations now seem to imply?

Given that it would be these soft-skills required to deliver these change strategy projects a valid question may well be: Is it acceptable for a project managers both unskilled in scope definition and business strategic matters, to be responsible for strategic change projects?

To clarify, a definition of soft projects is provided by McElroy (1996) is '. . . [the] term soft project is used to describe any complex task which aims to achieve an intangible result.''

A further definition by the UK project management association is:

> Soft project: A project that is intended to bring about change and does not have a physical end product.
>
> Association of project management APM (2006)

Unfortunately the Project Management Institute, Inc. (PMI) 'has not defined the term "soft project" in any of its currently published standards'.

Research by McElroy (1996) regarding the *Implementation of strategic change through projects* provides the following with regards to causes for poor performance in such projects:

> To implement strategic change, senior management has to overcome the inertia of the organization. By choosing to implement the strategy through the existing structures and hierarchies, senior management is, in essence, trying to use the 'status quo' to change the 'status quo'.

Additionally:

> To overcome these conflicts strategic change must be viewed in its wider context. Any strategic change means changing the organisation's culture. Therefore in order to select the appropriate implementation strategy, the organisation must be able to define the existing and future culture. This unfortunately is not often recognized …
>
> … In restructuring the organisation and workforce it is clearly necessary to pay close attention to the organisational and attitudinal issues - the *soft* aspects of the change. These are commonly the least understood areas of strategic change and those on which such change can most easily fail. It is therefore vital to the success of the change that there is a clear understanding of:
>
> - What is a soft project
> The term *soft project* is used to describe any complex task which aims to achieve an intangible result. …
> - How do soft projects differ from hard projects
> *Some of the distinguishing characteristics of soft projects are:*
> - *typically, the objective and scope are not precisely known at the outset;*
> - *costs are more difficult to estimate;*
> - *the logical relationship between activities is often fuzzy*
> - *success is heavily dependent on the attitudes, motivation and behaviour of all the people involved;*
> - *there is substantial interaction between the project and the organisation in which it is being implemented;*
> - *performance criteria and other outputs are not easily tested and measured.*
> - *Poor performance associated with soft projects …*

It is clear from McElroy's description of the traits typical of soft projects, that some responsibility for assisting with defining requirements of these front-end tasks (and

redefining - due to the intangible project scope) is required in the project and therefore within the remit of the project manager.

A further question which needs to be asked is: Who will manage this aspect of *soft projects* during implementation if not the project manager?

3.5 Summary

A major failing has been identified by Morris, which is becoming increasingly critical. In conclusion the present author can only echo a further observation of Morris (2006) that of:

> It is important … for the research community to continue to critique the limitations implied by these standards [in reference to PMI's PMBOK]… [and that] … If they remain unchallenged the discipline (the profession) risks being defined by models which ignore areas that are critical to achieving satisfactory outcomes.

4. Organisation: Structure and Culture

4.1 Introduction

Traditionally, the organisational structure in place within a business would have been that known as a *functional* organisation structure. This is where the business is operated in independent units, generally dependant on technical ability or skills type e.g. IT, Engineering, Marketing, Purchasing, Administration etc. However, as project management lessons have been learned and business practice has evolved, it is evident that this structure does not provide for the needs of all organisations, regarding project delivery, resources allocation and customer satisfaction; without being detrimental to other business operational needs.

Within all organisations a strategic decision needs to be made with regarding how business tasks will be implemented. Effecting this decision are many criterion regarding the organisations size, strategy, available resources, products & services, market areas and regions, customers needs etc. There are several options to choose from, each offering differing benefits and inherent issues. The most common of the structures are:

- Functional organisation
- Dedicated project teams
- Matrix
- Network organisation

The following provides an overview of the different structures, with a view to highlighting positive and negative aspects of each, vis-à-vis restructuring from an existing *functional* organisational structure.

4.2 Functional organisation

Here projects are undertaken within the traditional functional organisation without change. Projects will be managed within the normal hierarchy of the organisation with either top management taking on responsibility for the management of the project, or the functional area best suited to undertake the lead role; with the other functional departments providing resources and services, as and when required.

This structure provides the easiest option for a project as a one-off undertaking; mainly due to:

- minimal intrusion on business-as-usual
- flexibility in the use of staff
- in-depth expertise via best allocation of ownership to those most suited
- easy transition for team members back to functional departments upon completion of their responsibility.

However, several intrinsic problems are inherent such as:

- lack of focus on undertaking
- poor team integration through delivering only minimum time and effort to the undertaking
- slow (longest) realisation of the project outcome
- lack of ownership.

4.3 Dedicated project teams

This structure is also referred to as a *projectized* organisation; where members from each functional department are chosen to make-up the project team, removing them from the normal working environment. Team member focus on the undertaking is generally consistent and due to the normal high priority and/or sensitivity of the project, the project manager may be given *carte blanche* with regards to resources, in order to deliver the desired end result.

Perceived benefits are:

- simple to implement, in that the functional organisation remains the same
- faster project delivery through dedicated team members committed to the undertaking
- cohesion of the team members via team-member empathy through shared focus and goals

Examples of inherent weakness are:

- more expensive due to full-time focus of resources and creation of a project manager role
- internal strife, due to *projectitus* – a we/they mentality as a side-effect of isolation from the main organisation and deemed importance of the project outcome
- difficulties upon project completion and integration to former work environment

Unlike the other structures, this option is considered to be the most limiting of technical expertise, mainly due to the isolation of each individual team member from their own specialist functional department resulting in a restriction in technical know-how to that of the solitary team member. Again, the transition post-project to the functional department from whence they came is problematic due to the prolonged absence from the working environment.

4.4 Matrix arrangement

This organisational structure as described by Gray (2006) is a hybrid organisational form in which a horizontal project management structure is 'overlaid' upon the *normal* functional hierarchy. Here there are two chains of command, the functional managers whom related team members will report to directly and the project managers, whom all participants of involved project will also report to. This is obviously more stressful for the project participants, having to report to dual managers with conflicting priorities; however a hierarchical superiority (pecking-order) will generally be present depending on the differing matrix arrangements described below.

Matrix types are listed below with perceived suitability and selection criteria highlighted.

- Weak matrix lightweight – this is similar to the functional approach with the exception of a project manager, who is tasked with the drawing-up of schedules and check-lists, collating of information for project status and facilitating the project completion. Here the functional manager has greater influence and control of the undertaking.
- Balanced matrix or middleweight – this is more in line with general expectations of a project manager role and where the project manager and functional managers attempt to act as a partnership in order to facilitate the project undertaking. Here the project manager would have greater or equal overall control of the project and the functional manager would be obliged to deliver services/products under his remit, to schedule and quality as required.
- Strong matrix or heavyweight – here the project manager has greater control, including scope trade-off and that of assignment of functional personnel. This situation can be sometimes synonymous to a contractor/sub-contractor relationship where the main contractor has overall control and responsibility and the sub-contractor is obliged to deliver his obligations on-time and to defined specifications.

However, demarcation of the matrices is not so clear in practice and is dependant on the relative authority of both the project manager and functional managers. This is depicted in figure 1 below.

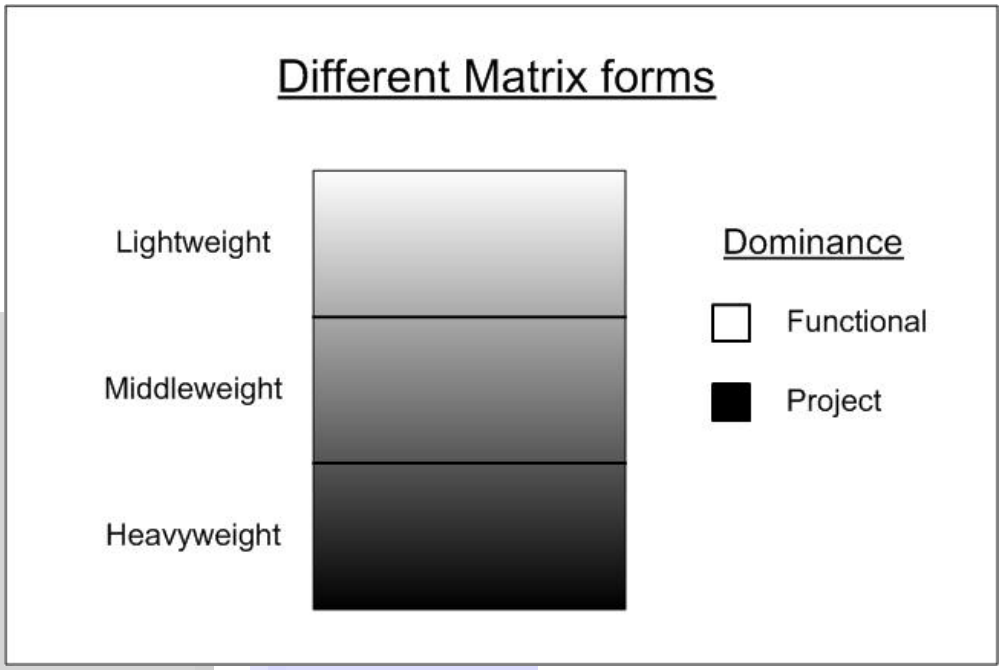


Figure 1: Blurred demarcation of matrix arrangement

Due to the lack of clear segregation of the different matrices, specific inherent advantages and disadvantages would be too subjective to define; however, common intrinsic criterion for which to evaluate the choices is provide below:

4.4.1 Benefits of matrix structures

- Benefits are that of efficiency due to the possibility of sharing of resources and solutions across different projects.
- Strong project focus is also maintained via the dedicated project manager.
- Easier post project transition due to the overlaying of the project structure and continued association of the team members with their functional departments.
- Flexibility is possible with regards to resource usage between projects and functional departments.

4.4.2 Issues of matrix structures

- A dysfunctional relationship between the project and functional managers may be unavoidable due to the conflict of priorities intrinsic to their roles. This conflict is deemed by some to ensure a happy-medium ensues, regarding the balance of technical complexity and unique project requirements. The possibility that the conflict can overspill the project environment is however a real risk.
- Conflict can also occur between conflicting projects especially where key resources are scarce.
- Stress caused to team members due to conflict of priority between functional manager and project manager is a clear issue.
- Slower project delivery.

4.5 Network organisation

This Network structure has long been the organisational structure of choice for construction companies; however the increasing use within organisations for projects is generally a result of globalisation and corporate down sizing. Within this organisational structure a lead company will act as a coordination and communication hub; while the alliance organisations provide services, support and deliverables as required. This allows companies to focus on core business/competencies without isolating themselves from the more diverse of opportunities.

Strengths are:

- Cost reduction – outsourcing provides greater choice and competitive pricing.
- High-level of experience – all none core tasks can be outsource to specialists; who can use core competencies using a similar business strategy.
- Flexibility – companies are no longer restrained through lack of own resources.

Weaknesses may be:

- Coordination and communication breakdown – tasks which are not easily defined for control purposes may require a high level of coordination, which can prove difficult due to non-aligned commitments and differing perspectives.
- Loss of control – where there is much reliance on resources under the control of partner companies, delays and issues may not be known until delays are inevitable.
- Conflict – different cultures, values and priorities may create conflict.

Collaboration of resources from remote and partnering organisations is becoming increasingly commonplace. Through advancements in digital communications, the internet and video conferencing, many of the boundaries are removed; however, in the other extreme situation, it may also be the case that these partners will need to work closely together (e.g. shared site location) and a more personable skill set (soft-skills) would be required to avoid conflicts.

4.6 Culture

The cultural issues of an organisation are by no means of lesser importance to that of opting for the right organisational structure with regards to delivering project results; as surely emphasis should be placed on creating and maintaining a culture that is conducive to project delivery (or other desired outcome) and team work, before attempting to restructure the organization for increased productivity.

According to Gray (2006) culture provides several important functions in an organisation. These are:

- Provides a sense of identity which generates commitment and provides justification for devoting energy and loyalty to the organisation.

- Helps to legitimise the management system and helps to clarify the authority relationships by providing reasons as to why people are in a position of authority.
- Clarifies and reifies standards of behaviour. What is acceptable and what may be taboo. Examples are: dress-code, working hours, working practices, risk taking, decision making.
- Helps create social order within an organization.

4.6.1 Defining culture

Gray (2006) draws on research that suggests ten primary characteristics can adequately define the culture within an organisation. These are:

- Member identity – the degree to which employees identify with the organization as a whole rather than with their type of job or field of professional expertise.
- Team emphasis – the degree to which work activities are organized around groups rather than individuals.
- Management focus – the degree to which management decisions take into account the effect of outcomes of people within the organization.
- Unit integration – the degree to which units within the organization are encouraged to operate in a coordinated or independent manner.
- Control - the degree to which rules, policies, and direct supervision are used to oversee and control employee behaviour.
- Risk tolerance – the degree to which employees are encouraged to be aggressive, innovative, and risk seeking.
- Reward criteria – the degree to which rewards such as promotion and salary increases are allocated according to employee performance rather than seniority, favouritism, or other non-performance factors.
- Conflict tolerance – the degree to which employees are encourage to air conflicts and criticisms openly.
- Means versus end orientation - the degree to which management focuses on outcomes rather than on techniques and processes used to achieve those results.
- Open-systems focus – the degree to which the organization monitors and responds to changes in the external environment.

Gray (2006) also provides an illustration (see figure 2) depicting perceived ideals for these criteria, for the promotion of project delivery within an organization.

Figure 2: Ideals for project focused organisation. Gray (2006)

The requirement for employees to effectively communicate with, fit-into and be accepted by differing organisation cultures is become increasingly important as companies form alliances and partnerships with customers and other suppliers, and form network organisations. Employees responsible for the managing and undertaking of projects are probably the most extreme case of this requirement, due to the broad scope of environments and external interfacing that the project may involve.

4.7 Summary

The need to have an effective working environment is paramount to the continuing success of the organisation. Thus it is the employees that perform the tasks and deliver the projects that are responsible for the continuation of the business' existence. Adequate consideration of these employees must be at the fore, prior to implementation of organisational structure and/or re-organising the business to meet current business demands.

Where re-organisation of an existing enterprise is required for the undertaking of projects; identification of the existing and desired future cultural make-up of the organisation may be the prudent starting point. Using the above described analysis methods to determine organisation culture would provide this required perspective.

5. Managing Risk

Float like a butterfly. Sting like a bee. Your hands can't hit what your eyes can't see.

Muhammad Ali (196?)

5.1 Introduction

The global economy has given businesses the ability to market products and services all over the globe. It has also allowed them to develop partnerships and alliances throughout the world; which has, quite literally, taken the project manager into unfamiliar territory.

Uncertainty breeds risk and with each area of unfamiliarity a new opportunity for risk to infiltrate the project is presented. Therefore the project manager must be an expert in the art of risk management.

Risk Management is unquestionably the essence of project management, Gray (2006); and therefore the *raisons d'être* of every project management principle, book and aspect of each methodology; is to aid the forecasting, assessment, reduction, containment, counteracting and eradication of risk. There is an abundance of literature on the subject, which serves to prove that there is also an unfaltering desire by many, especially project managers, to learn how to 'tame the beast'; before it becomes too late for any countermeasures to have any noticeable effect.

However, it is seldom that internally created risks are mentioned. That is, risk created within the enterprise and which are consequently inherent to all undertakings, and possibly having a negative multiplier effect on the project outcome.
Surely, it is logical to address those issues at home, before we seek potential issues elsewhere?

5.2 Internally generated risks (IGR)

The inclusion of the following research into the identification of additional risk occurrence is provided to broaden the appreciation of risk management.

Barber (2005) advises:

> When a project team has fewer staff than it needs to operate effectively, struggles to deal with bureaucratic financial constraints, or is not supported by higher management, the project is likely to be less successful and may even fail. These are sources of risk to the project, but they cannot be blamed on the external world, nor on the nature of the task. They arise from how the project and its host organisation are set up and operate. They are internally generated risks (IGR).

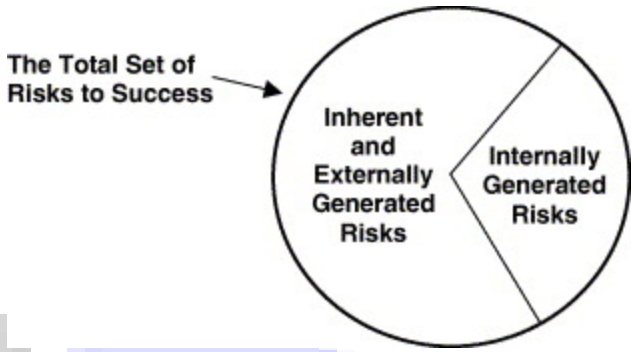


Fig. 3: Distinction between internally generated, inherent, and externally generated risks Barber (2005)

Risk cannot be both externally generated and internally generated – they are mutually exclusive categories. Similarly, a risk also cannot be both inherent and internally generated. A total possible set of risks is illustrated in Fig. 3.

The aim of the research as a first step to understanding IGRs was proving of the following hypotheses:

H1. Internally generated risks are common.
H2. Internally generated risks are significant.
H3. Internally generated risks are poorly managed.
H4. The amount of internally generated risks in a project is related to how effective it is as a project organisation (its maturity).

The research was unfortunately limited to only nine projects; however each involved more than three permanent staff, lasting more than twelve months and occurring in different geographically regions. Risk data were gathered from a series of workshops and one-on-one confidential interviews with project stakeholders, on a range of issues related to the key question:

“What makes it hard for you to succeed in your role in your project, or for the project to succeed as a whole?”

Barbers findings are:

1. confident that internally generated risks are common in projects
2. confident that internally generated risks are significant in projects
3. confident that internally generated risks are poorly managed in projects
4. some confidence that internally generated risks in a project is related to how effective it is as a project organisation

Summary

Although the nine projects where a small sample, the data indicated strongly that internally generated risks are common, significant and poorly managed. This should be of concern, since projects are pervasive in society today.

There are many reasons why IGRs may not be managed well.

- The first is that risks involving people tend to be sensitive to talk about and difficult to resolve. For example if a manager micromanages subordinates. Barber advises that experience has proven that in such cases it is likely that people will simply put up with the problems, rather than face the sensitive task of seeking management action.

- If a project is under resourced, staff is being overworked or an internal process is ineffective then risks will be created. These risks are often linked to a decision or policy that is 'owned' by someone – the person who approved the project despite a lack of resources, the person who is demanding more work than is possible or the owner of the ineffective process or rule.

These internally generated sources of risk may be known and discussed, but in many organizations they are unlikely to be documented in a risk register. To do so might be seen as insensitive or provocative or simply as politically inappropriate.

- Internal risks are also often seen as a fait accompli – such as when a project manager is told to "just do it" despite having inadequate resources to do the work properly. Reporting such risks may also be seen as being provocative or recalcitrant – as making a political point at the cost of the manager involved.

- Finally, internally generated risks are often intangible and therefore not easily quantified. They do not lend themselves to being managed using risk processes that rely upon quantifying and classifying risks. Managers may also feel uncomfortable trying to describe, assess and classify risks that are about human relationships, culture or behaviour. It may also be seen as a waste of time to bother documenting issues that are intangible or that are thought unlikely to be managed.

Ultimately, these issues mean that internally generated risks are less likely to be managed properly.

6. Leadership

6.1 Introduction

Leadership is possibly the singularly most important attribute of the modern project manager. Where it may be possible to deliver satisfactory project outcome for the simplest of projects that require only meeting specifications and providing on-time delivery within estimated costs, all other undertakings require more than the simplest of measures.

It is through leadership that we avoid project team members, including contractors and subcontractors, adopting the *work to rule* aptitude; that is, where only contractually obliged performance is provided without consideration of the holistic view of the project requirements. Additionally, it is through leadership that project completion in the face of adversarial conditions can be achieved through a *hook or crook* approach; for example, those features which are proving to be a hindrance to the desired performance are dealt with in either contractual or counter-trade approach and those aspects that require leadership are identified and guided in the right direction by the project manager.

6.2 Who/how - examples

Today project managers must have exemplary *soft-skills* in order to manage relationships with all the different project stakeholders.

Heerkens (2002) advises that:

> Since managing projects is all about getting things done through other people, your skills in dealing with people are of immeasurable value. Closely tied to your interpersonal skills are your behavioral skills: your personal conduct, style, and approach. Together, these two skill sets are often called the "soft skills."
>
> Here are some examples of soft skills:
>
> - team and individual leadership
> - oral and written communication
> - conflict resolution
> - negotiation
> - influencing
> - delegating
> - coaching and mentoring

One which the present author would add is *common-sense*.

Additionally, Adair (2003) proffers that 'personality and character cannot be left out of leadership.' The seven important ones he lists are:

- Enthusiasm
- Integrity
- Toughness
- Fairness
- Warmth
- Humility
- Confidence.

In line with the above, Goleman (2001) provided analysis results of 188 large global companies including Lucent Technologies, British Airways, and Credit Suisse.
Here he explains 'that the most effective leaders are alike in one crucial way: they all have a high degree of what has come to be known as *emotional intelligence*' – the components of which are: self-awareness, self-regulation, motivation, empathy, and social skill.

> … intellect was a driver of outstanding performance. Cognitive skills such as big-picture thinking and long-term vision were particularly important. But when I calculated the ratio of technical skills, IQ, and emotional intelligence as ingredients of excellent performance, emotional intelligence proved to be twice as important as the others for jobs at all levels.
>
> … when the company's star performers were compared with average ones in senior leadership positions, nearly 90% of the difference in their profiles was attributable to emotional intelligence factors rather than cognitive abilities.

6.3 Building social networks

Grey (2006) suggests that the network of *stakeholders* is identified through the formal mapping (a specific organisational chart) of the project dependencies at the early stages to identify the parties which we will need cooperation, agreement/approval and whose opposition will prevent us from accomplishing the project. The present author suggests that those finding this approach unpalatable could possibly achieve the same results by using the Project Organisational Structure chart, (if created) to meet the same ends. Additionally, if the courting of adversaries is deemed unacceptable, then comfort may be found in the knowledge that being the first to offer a helping hand, would thus earn the privilege of *cashing-in* that favour at a later, more strategic time.

Success or failure of a project is dependant on the performance and contributions of all parties including top management, functional managers, customers, suppliers and others. Cohen and Bradford (1990) explain a concept where influence can be used as 'currencies' which takes on different forms dependant on environment and deemed seniority of the parties involved, for example *Task related currency* – may be the lending and borrowing of resources such as tools or information such as technical knowledge, where as *Position related currency* - may include acknowledgement and reward for performance or award of assignment which can result in promotion. Others are: *Inspiration-related*,

Relationship-related and *Personal-related* currencies. Here it is easy to see a mutual-relationship trend emerging of '*you scratch my back, and I'll scratch yours'*.

The present author has witnessed this type of conduct where a *door-always-open* policy was adopted by one of the European engineering contractors on-site in extreme environmental conditions (fifty degree heat and over ninety percent humidity) and during a Holy month of fasting. Here, non-fasting project parties were encouraged to call in for much needed refreshment and shelter from the elements; out of sight of those partaking in the religious ritual. This practice outlasted the holy month and became routine throughout the remainder of the project duration and the generosity was repaid on many occasions through alliances and friendships formed with other contractors, members of the client management team and business competitors.

6.5 Skills

According to Adair (2003), 'Managers become leaders when their personality and character, their knowledge and functional skills of leadership are recognised and accepted by the others involved.'

The differences and overlaps of leadership and management is the topic of much debate. However, Adair (2003) has identified five distinctive traits not generally found in management. Here he says that a leader must:

1. Give direction
2. Provide inspiration
3. Build teams
4. Set an example
5. Be accepted

In line with the above, Goleman (2002) proffered results of analysis of 188 large global companies form diverse sectors, including Lucent Technologies, British Airways, and Credit Suisse. He explains 'that the most effective leaders are alike in one crucial way: they all have a high degree of what has come to be known as *emotional intelligence* – the components of which are described as: self-awareness, self-regulation, motivation, empathy, and social skill'.

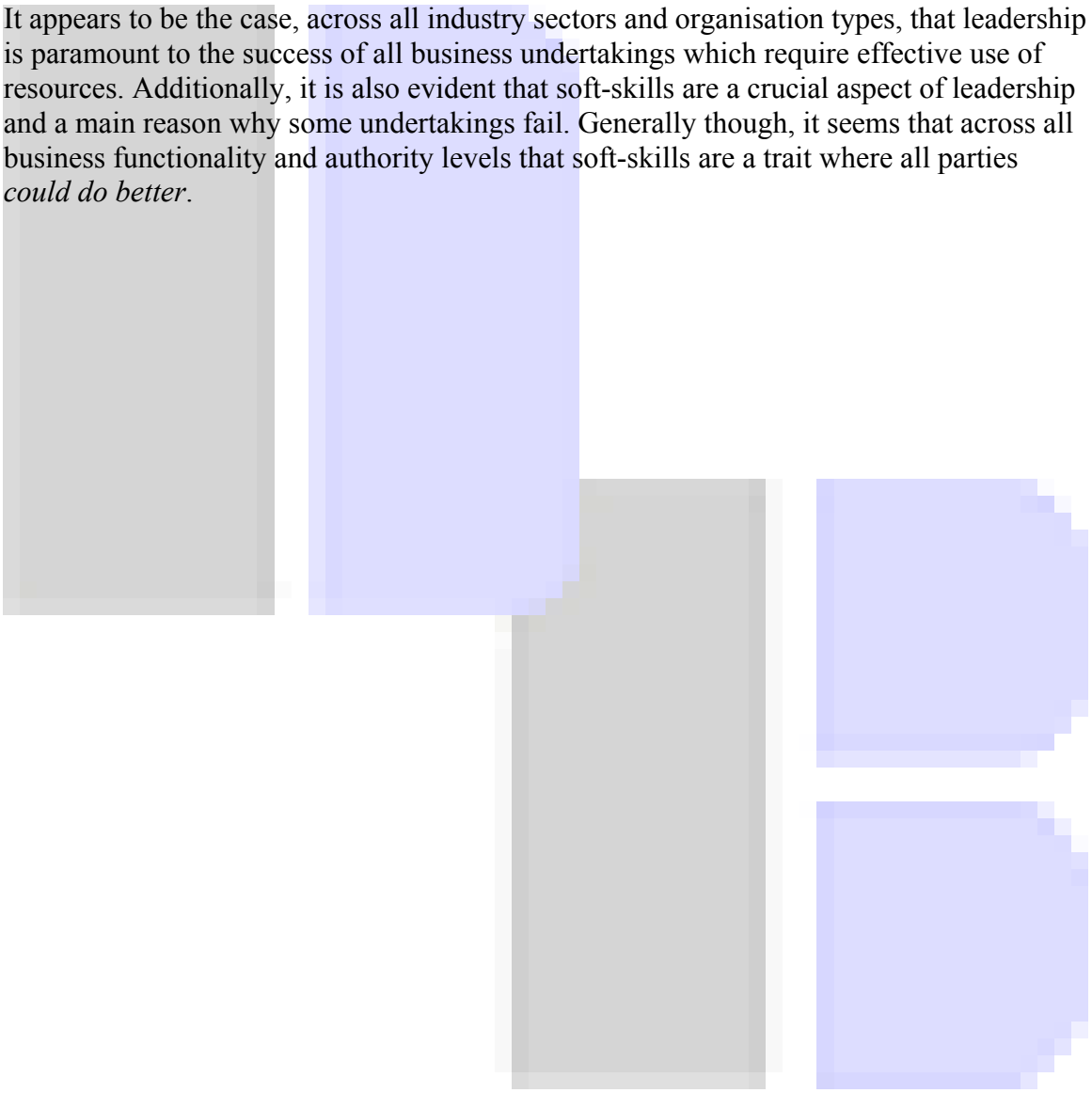
Goleman further adds that:

> … intellect was a driver of outstanding performance. Cognitive skills such as big-picture thinking and long-term vision were particularly important. But when I calculated the ratio of technical skills, IQ, and emotional intelligence as ingredients of excellent performance, emotional intelligence proved to be twice as important as the others for jobs at all levels.
>
> Additionally, when compared to the company's star performers with average ones in senior leadership positions, nearly 90% of the difference in their profiles was attributable to emotional intelligence factors rather than cognitive abilities.

The British Computer Society (BCS) also found that one of the main reasons for IT projects failure to be lack of leadership; and found that this was largely due to lack of management and communication skills; not just by the project managers but generally across all functions.

6.6 Summary

It appears to be the case, across all industry sectors and organisation types, that leadership is paramount to the success of all business undertakings which require effective use of resources. Additionally, it is also evident that soft-skills are a crucial aspect of leadership and a main reason why some undertakings fail. Generally though, it seems that across all business functionality and authority levels that soft-skills are a trait where all parties *could do better*.



7. Managing Project Teams

7.1 Introduction

The following chapter will endeavour to provide an overview of the principles of project team management in order to highlight the importance of the concept and inherent difficulties to be overcome in order to congeal individuals from possibly diverse backgrounds and cultures and differing levels of the organisational hierarchy, in order to arrive at a cohesive working group.

There is much literature and research on the subject of *managing project teams*. This research is generally an investigation of the *ethos* of the project team, of the interpersonal relationships and of the need for all parties involved to bring more to the table than merely the skills and efforts required to perform their own tasks. *Synergy* is the crux of effective project teams.

Gray (2006) explains synergy using the following equations:

Positive Synergy 1 + 1 + 1 + 1 + 1 = 10
Negative Synergy 1 + 1 + 1 + 1 + 1 = 2 (or even -2)

According to Bowditch and Bouno (2005):

> The concept of cohesiveness refers to the degree to which project members wish to remain in the project team and the strength of their commitment to the team and its goals. As a result, degrees of cohesiveness may determine whether a group of people can be considered to be a team of 'merely' a working group.

7.2 Team building

In order to form a cohesive team that possess this positive energy and which accept the leadership of the project manager, several stages of group progression must occur. These are provided below:

- Forming
- Storming
- Norming
- Performing
- Adjourning

A general description of the five stages is provided below:

Individuals are introduced and encouraged to become familiar, learn more of the project, customer and users and discuss how the project will be undertaken to get a first experience of team member's personalities, traits, dislikes and hopefully the individuals begin to bond as a team. The project manager must ensure that these early meetings are competently arranged and supervised in order to expedite the gelling of the team and ideally identify any areas for serious conflict before they occur. Ground rules must be made aware of at this early stage in order to set the boundaries and allow feedback to these *rules of play*. This first step can be expedited through education of the five typical stages herein, ensuring that the members expect and recognise the inherent difficulties and allow for self-resolve of conflicts and/or acceptance of differences.

Storming is where the clashes of ideas, personalities, opposed opinions of best practices and working procedures comes to a head. Here the project manager must avoid micro-managing the group, by allowing the team to arrive at their own resolve for disputes and form their own opinions, stepping in only to mediate and provide guidance and leadership when required. As the team become to realise the *pecking order* for the project team and accept their reliance on each other their joint efforts begin to bear fruition in the *Performing* stage where the projects undertakings will be performed and results delivered. Individuality must be accepted and personal preference and prerogative respected. Else *Groupthink,* a sheep-like behaviour will ensue, breeding narrow-mindedness and intolerance of others.

The project manager must also be aware of own limitations and not restrict the performance of the project team by micro managing the problem solving activities. This can stunt the growth of the project team and create negative synergy through undermining of team efforts and the decision making process. This can also be interpreted as *steeling the thunder* from the successful team efforts while separating one-self from undesired outcomes. Furthermore, the team must be rewarded as a whole for success and likewise must accept failures as a group.

Upon satisfactory completion of the project undertaking, the team will begin to disband. *Adjourning* is generally a gradual process which can lead to unmotivated remaining team members and an over familiarity of the project as a whole, as members *dot the i's and cross the t's* for those that have moved on to pastures anew. It is important for the project manager to ensure that adequate hand-over of tasks, documentation and information to those tasked with the final steps of this stage and reward efforts of all team members prior to reassignment to ensure that the positive aspects of team work and any lessons learned are carried forward for future undertakings.

7.3 Other issues identified

Other frustration can occur within a project environment, commonly referred to as *projectitus.* This is a term use to account for many differing, yet negative, connotations on the project and/or organisation responsible for the project undertaking. Examples are:

- Group-thinking – narrow mindedness as described above.
- Bureaucratic bypass syndrome – generally a 'special project team' having additional privileges and powers to bypass bureaucratic constraints in order to encourage speed of development and/or *thinking outside of the box.*
- Team Spirit becomes Team infatuation – this is where working in a positive, highly charged and often euphoric environment creates an anti-climax when normal working practices return on project completion.
- Going Native – is a major drawback of working within the client environment for lengthy periods and generally results where the client's exact requirements are not met by the project undertaking. Here the contractor agent looses focus of priorities due to close relationships with the client or alienation from the contractor organisation; often resulting in scope-creep and customer dissatisfaction of end results through familiarity.

7.4 Managing of conflict

Conflict arises from differences. When individuals come together in work teams their differences in terms of power, values and attitudes and social factors all contribute to the creation of conflict. It is often difficult to expose the sources of conflict. Conflict can arise from numerous sources within a team setting and generally falls into three categories: communication factors, structural factors and personal factors (Varney, 1989). Conflict is a natural occurrence in all relationships and working environments, which can bring about positive as well as negative results.

What is important and also what can be the differentiating factor between the two conflict types, is how effectively the dispute is dealt with. It is therefore important to ensure that the team is aware of the likelihood of conflicts and how to resolve those when a stalemate is met or disputes become unproductive.

Gray (2006) distinguishes between conflict types as *functional* and *dysfunctional*; and advises that the demarcation between the two is unclear and subjective. He also posits that functional conflict can bring out otherwise unthought-of of solutions bringing about originality. Whereas dysfunctional conflict is that which erodes at the team spirit and must be defused by the project manager in one of the following resolution options:

- Mediate the conflict – find a common ground to defuse the dispute.
- Arbitrate the conflict – project manager decides on the best solution for the project after listening to all parties.
- Control the conflict – attempt to inject humour and remind the parties of the team and project purpose. If necessary reallocate the problem task to other team members.
- Accept it – live with the conflict and monitor the parties.
- Eliminate the conflict – remove either or both of the team members from the project.

7.5 Virtual Teams

The coincidental side-effects or intended consequences of globalisation, network organisations, partnering and alliances has resulted in the increased acceptability for a working team to be employed remotely from different locations or even countries. Recent advances in global telecommunication, remote-access software applications and high speed internet access; has meant that the intricacies of this working practice are become less problematic year-on-year. However, control of the project team can become strained due to differences in working times or even working week in some regions. The project manager must be mindful of the differing working environments and the focus needed by the team in order to prevent issues like *Going Native* (described above) and missed opportunity through communications problems. Additionally, adequate controls must be in place from the outset, to allow for a relationship of trust through none-intrusive reporting procedures.

7.6 Removal/dismissal of team member

7.6.1 Introduction

Although outside the general scope of this essay and being an ultra-sensitive topic, due to the ever-changing and unaligned regulations in force internationally, it would be remiss to avoid this subject in its entirety.

Where the project manager has not the time, remit or adequate availability of resources from which to hand-pick his team and/or adequately check references; team members may be employed on trust only. Hence, it is realistic to assume that any project manager may find themselves in the unenviable situation of being forced to remove individuals from the project team; due to matters such as laziness, lack of qualifications or in extreme cases, gross incompetence.

7.6.2 Areas for consideration

In today's litigation-prone business environment, dismissal of an employee can be a minefield of hazards which could be both time consuming for the project manager and breed negativity throughout the project environment.

It may well be that a third party forces the dismissal, e.g. a contractor's major customer demands that an employee be removed from their project or in instances described by Taggar & Neubert (2000), where through poor performance a team member is isolated sabotaged and ostracised.

In such cases where the contractor (employer) has no real choice, dismissal may be justified but they would still need to act reasonably and consider re-employment elsewhere.

The Advisory, Conciliation and Arbitration Service (ACAS 2006) advise the following in order to avoid unfair dismissal hearings:

> If you reasonably and genuinely consider that the employee was not capable and provided you act reasonably, it is likely that you will be considered to have dismissed the employee fairly. However, in almost all cases, there should be a proper appraisal and warnings procedure with agreed time scales and targets for improvement before a final decision is taken. The views of superiors and peers, other previous complaints, and specific instances as to the employee's failings will all be taken into account in assessing the reasonableness of your decision and should therefore be documented at the time they arise.

Additionally, they advise that most offences lead to a series of oral and written warnings before any dismissal. General guidelines to avoid unfair dismissal litigation are:

- Investigate the circumstances before taking any formal action.
- Typically, you might give an employee one spoken warning and two written warnings before dismissal. Spoken warnings will often be removed from an employee's disciplinary record after six months, and written warnings after 12 months (if there are no further disciplinary offences).
- A formal warning should include a time limit within which you expect improvement and an explanation of the consequences otherwise.
- Apply the rules fairly and consistently. An employee who can show that you applied the rules inconsistently may be able to claim unfair dismissal.
- Keep written records of all disciplinary action you take. Include a record of any steps you have taken to investigate and address the cause of the problem.
- All employees have the right to be accompanied by a colleague or trade union official at any disciplinary hearing.
- Remind employees of their right to explain their conduct or suggest counter-proposals.

7.6.3 Summary

Generally, employee/team member dismissal would not be within the remit of the project manager. However where other appropriate measures are not in place (e.g. Human Resources dept.) or where the project manager has applicable authority and the 'status quo' is not conducive to successful working practices, the project manager may be left with no other alternative.

A control which goes some way to counteracting the inherent implications of the situation as described above, is ensuring that unambiguous documentary evidence of the delegation of duty and unequivocal acceptance of this responsibilities by the employee exists.

PRINCE2, a popular project management methodology developed by the Office of Government Commerce (OGC), provides for this with the 'Work Package'. This concept is described by the OGC (2003) below. Note that the term *product* within PRINCE2 refers to both physical and intangible project deliverables such as buildings, machines and documentation alike.

> Work is released to a team member or Team Manager in an agreed Work Package. The Work Package will contain the Product Description(s), constraints such as time, cost and interfaces, reporting and product hand-over requirements and any other documentation or products necessary for understanding and implementing the Work Package.

8. Conclusions

A constant theme herein and throughout much of the research materials (journals, internet resources and literature) used in the preparation of this essay, is that of the requirement for soft skills within the project team. The relationship expected between the modern project manager and client appears to be closer to that of the modern day doctor and patient relationship than that of the *over the wall* management style of the traditional project manager.

Communication is paramount for modern day project management and the need for increased communication skills is evident at all levels. Appreciation of differing cultures and of others business environments is also key, with the ability to transpose one-self into the mindset of another in order to appreciate both sides of an issue being a much desirable trait.

Businesses are expanding their markets further a field due to opportunities created by the global economy and the world is appearing smaller year-on-year with advances in technology, telecommunications and efficient transport. As a result, it has become increasingly acceptable for project team members to be based in several different time-zones without adverse effects on project delivery. This extreme business practice highlights the need for a personable temperament and for acceptance of others.

The ability to lead and to be led has also identified itself as an intrinsic trait for project managers. One must be able to realise and trust the capabilities of others who are best suited and experienced to perform a given task and be able to rely on them without the need to micro manage.

Appreciation of business strategy and front-end knowledge is also crucially important for the future project manager. Business skills are required to gain a full appreciation of the organisational needs and intentions, so that proactive responses can be made when new opportunity arises. Business strategy must be a priority for each of the key roles within the organisation and must be recognized by every level of the enterprise. Each must have aspirations to achieve business goals if a healthy productive client oriented working culture is to exist.

This concept is reiterated in the *APM Today* magazine (2007), in which Kent Beck (creator of *Extreme Programming* practices and Founder and Director of Three Rivers Institute) tells that:

> He wants his ‘programmers to think of themselves as part of the business and not as coders or testers. They need to develop the mindset that creates an attitude like that of the janitor at NASA who says his job is to get men on the moon. Equally, a project manager should see him or herself as someone who creates value for shareholders.

A further revelation is that of the increasing trust in the project delivery processes and procedures as a vehicle for delivering an increasing array of outcomes, both physical and cultural and with both definable and intangible expectations. This is a far cry from *traditional* project management described and the outset.

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