# The management of project management: A conceptual framework for project governance

Eric G. Too<sup>a</sup>, Patrick Weaver<sup>b</sup>. a University of Southern Queensland, Australia b Mosaic Project Services Pty Ltd, Australia

#### Abstract

For an organization to create optimal value from its investment in projects there must be a clear link between the outputs created by the projects and the requirements of the organization's business strategy. This means that organizations that have a structure in place for aligning the project deliverables with their organizational goals will be better placed to realize their investment in projects, and achieve the value defined by their business strategies. This paper examines existing research, ideas and concepts of project governance and enterprise project management, and offers a framework to build on current theory development and practice. Synthesizing existing literature of project/ programme management, governance of projects and hence create value for organizations. These four elements are:

- 1) Portfolio management: focused on selecting the right projects and programmes to support the organization's strategy, and terminating ones that no longer contribute to the business success of the organization;
- 2) Project sponsorship: providing the direct link between the executive and the project or programme manager, focused on the whole project lifecycle;
- 3) Project Management Office (PMO): providing oversight and strategic reporting capabilities;
- 4) Projects and programme support: the effective support and management of projects and programmes is the measure of an effective governance system.

The purpose of the framework described in this paper is to provide guidance to organizations in the development of effective project governance to optimize the management of projects.

*Keywords:* project governance, multi projects environment, strategic alignment, enterprise project management, business value

## 1. Introduction

There is a significant growth in the adoption of project management disciplines to accomplish work in different sectors and industries (Winter and Szczepanek, 2008). Economic pressure to reduce time to market means that projects rarely operate in isolation within an organization and are usually delivered to satisfy broader strategic priorities (Office of Government Commerce, 2007b, 2009). This pressure has driven an increase in the number of projects undertaken simultaneously within organizations, and consequently the complexity of managing their interdependencies and multiple implementations (Platje et al., 1994a; Turner and Speiser, 1992). The management of multiple projects – including programme management and portfolio management – is now the dominant model in many

organizations for strategy implementation, business transformation, continuous improvement and new product development (Winter et al., 2006). As the use of multi projects grow, the value created by these projects is subjected to more scrutiny. For example, Marnewick and Labuschagne (2008), through action research, found that many projects are not completed within the defined time and budget and do not deliver the expected benefits to the organization. This appears to be largely due to the fact that projects are disconnected, managed as silos, or not aligned or governed as one seamless portfolio (Knodel, 2004). As a result, the management literature has recognized the importance of structured, disciplined management of multiple projects, advocating that, to create value for their organizations, projects are aligned with corporate strategy as part of the approval and initiating processes (e.g. see Aubry et al., 2007; Meskendahl, 2010; Milosevic and Srivannaboon, 2006; Shenhar, 2004)

Value and value creation are the central elements of business strategy and the success of organizations depends on the extent to which they create for customers what is of value to them (Mittal and Sheth, 2001; Payne and Holt, 2001). The value of a project refers to the explicit and implicit functions created by the project, which can satisfy the explicit and implicit needs of stakeholders (Zhai et al., 2009). The concept of creating value starts with the processes needed to encourage innovation and assess the viability of ideas, through to the management of the implementation of the related organizational change. Weaver (2012) argues that there are two interlinked systems within the concept of value creation in the context of managing projects<sup>1</sup>. The first element focuses on the development of an idea and the flow of innovation to value realization via projects. The second key element is the management processes needed to effectively manage the organization's project management infrastructure.

Significant research has been conducted on how projects and programmes can contribute to the value creation process (e.g. see Eskerod and Riis, 2009; Lechler and Cohen, 2009; Thomas and Mullaly, 2007; Winter and Szczepanek, 2008; Zhai et al., 2009). However, there is much less research to help general management deal with managing project management within the enterprise. Business utilizes project management disciplines and practices to achieve strategic goals and hence create value for their organizations. However, project processes are not independent entities. The success or failure of projects is not entirely within the control of the project manager and project team. Lack of support, conflicting objectives and other contextual issues in the domain of senior and executive management can influence the progress and outcomes of projects negatively. A key theme in the research is the lack of governance<sup>2</sup> (Crawford et al., 2008; Sargeant, 2010). Sanderson (2012) identifies the main performance problems as a result of misaligned or underdeveloped governance mechanisms, meaning that project actors are unable to provide a sufficiently flexible and robust response to the inevitable turbulence of the project or organizational environment.

Projects lacking effective senior management support cannot deliver the expected business benefits to an organization. Institutional arrangements and systems are needed to facilitate interfaces between executive management and project teams. Such arrangements will enhance the value created for the organization by ensuring the strategic alignment of its projects, decentralization of decision-making powers, rapid resources allocation and participation of external stakeholders (Muller, 2009). The challenge for organizations is therefore, to reconcile the internal management of projects with the governance structure so that the management of the projects is aligned with organizational strategic objectives.

<sup>&</sup>lt;sup>1</sup> See *WP1084 Governance Systems & Management Systems*: <u>https://mosaicprojects.com.au/WhitePapers/WP1084 Governance Systems.pdf</u>

<sup>&</sup>lt;sup>2</sup> Governance is the system by which organisations are directed and controlled (a full definition is included later in this paper).

This paper explores, in relation to current development and practice, the notions of project governance and 'enterprise project management, i.e. the 'management of project management' and how together, these functions can create enhanced value for organizations. The questions this paper addresses are these: Is there a difference between governance and management? And; if there is a difference, what are the salient functions and responsibilities of a governance system compared to a management?

To achieve these objectives the paper begins with a literature review to examine current research and directions on governance, and governance in multi-projects environments. The purpose of this section is to attempt to identify current research and theory on the relationship between governance and management. From the literature definitions will be examined, reviewed and even constructed, and gaps in the literature explored. The next section proposes a conceptual framework for project governance, containing four key elements of management structure, and based on the premise that without the effective support of the organization's governance and management systems project governance and management cannot operate effectively. Finally, the paper concludes with a recommendation for application of the framework in practice and suggestions for further research.

# 2. Literature Review

#### 2.1 Concept of Governance

The word governance is associated with words like *government, governing* and *control* (Klakegg et al., 2008). In the context of organization, governance provides a framework for ethical decision-making and managerial action within an organization that is based on transparency, accountability, and defined roles (Muller, 2009). In the literature both practical and academic, governance is a term that carries different meanings.

There are two schools of thought about governance. One body of literature postulates that different types of governance are needed in different sub-units of an organization. Some of these different types of governance include papers: on IT governance: (Marnewick and Labuschagne, 2011; Martin and Gregor, 2006; Sharma et al., 2009; Willson and Pollard, 2012); on knowledge governance: (Ghosh et al., 2012; Pemsel and Müller, 2012); on network governance: (Klijn, 2008; Sørensen, 2002); on public governance: (Du and Yin, 2010; Klakegg et al., 2008; Williams et al., 2010); and on project governance: (Abednego and Ogunlana, 2006; Miller and Hobbs, 2005; Winch, 2001). These views of governance appear to have been developed by IT managers, project managers, officials within government departments, and academics who work exclusively within these disciplines. Their view is that governance is a function of management or any entity responsible for making decisions and/or overseeing (controlling) the work of the organization or its projects. Each governance practice operates independently from the other and there is no integrated of theory of practice.

The second school of thought has been developed by organizations such as the OECD (OECD, 2004), various Institutes of Directors (e.g. Australian Institute of Company Directors, 2010; Institute of Directors Southern Africa, 2009) and the agencies responsible for governing stock exchanges. In this model governance is a single process with different facets (see Figure 1). Figure 1 is developed from several sources (see Appendix 1). The 'petals' represent the various functions of governing the organization under five main themes: governing relationships, governing change, governing the organization's people, financial governance, viability and sustainability. Other aspects of governance, such as the performance of the 'Board' and of individual directors have been omitted from this discussion in the interests of clarity.

The center of Figure 1 highlights the core values of a well-governed organization that includes its vision, values and ethics, commitment to corporate social responsibility (CSR) and the way the 'board' governs itself. These values are not absolute and should be the exclusive responsibility of the 'governing board' or its equivalent. Radiating out from the center, each petal focuses on an area of

governance requiring particular skills or knowledge. How governance is applied in each of these areas is a function of the core principles augmented by specific capabilities, knowledge and skills. For example, financial governance to the standard expected by the OECD (2004) is not possible without an appreciation of financial artifacts such as balance sheets. However, the petals do not operate in isolation; a governance failure in any 'petal' will impact other areas and the organization as a whole. For example, governance and management failures in the area dealing with the organization's staff, such as unfair dismissal or discrimination, can lead to litigation affecting the organization's reputation and market value.



Fig. 1. Petal diagram of governance.

The model in Figure 1 is designed to highlight both of these factors, governing any part of the overall structure of an organization requires specialist skills and knowledge whilst at the same time every aspect of the organization is linked and any failure in any specialist area will affect other areas and the organization as a whole. The art of governance is to develop systems that can simultaneously provide the specialist skills and knowledge needed by each aspect of the organization whilst remaining an integrated part of the overall governance structure. This model of governance is supported by the approaches taken by various governments<sup>3</sup> in legislating liability for corporate and governance failures. Through such legislation, Directors of corporations are made personally responsible for governance and management failures of the areas for which they have accountability and responsibility.

<sup>&</sup>lt;sup>3</sup> Examples include the Sarbanes-Oxley Act (SOX) legislation in the USA, CLERP9 and industrial manslaughter laws in Australia and EU directives.

The rise to prominence of the idea of governance stems from difficulties of hierarchical coordination by organizations or the state (Miller and Lessard, 2000). According to Klakegg et al (2008), it is therefore important that governance should cover all levels of organization flowing from the board level to management responsible for execution, down to the project level. Accountability for the overall governance system is vested in the 'board'; responsibility for implementing defined aspects of the governance system is delegated to the appropriate management levels together with the necessary authority to undertake the work. The delegation of corporate governance is supported by previous research which has identified that organizations tend to replicate and reapply their high level corporate governance arrangements and processes in divisional or smaller business unit activities thereby lowering the corporate integration and coordination costs (Blau and Schoenherr, 1971; Galbraith, 1967; Lawrence and Lorsch, 1969).

The purpose of, and necessity for, good governance is the creation and maintenance of sustainable value for the organization and its stakeholders. Sir Adrian Cadbury and his committee in producing the Cadbury Report (1992 p.14) has summarized this discussion in their definition of corporate governance:

"Corporate governance is the system by which companies are directed and controlled. Boards of directors are responsible for the governance of their companies. The shareholders' role in governance is to appoint the directors and the auditors and to satisfy themselves that an appropriate governance structure is in place. The responsibilities of the board include setting the company's strategic aims, providing the leadership to put them into effect, supervising the management of the business and reporting to shareholders on their stewardship"

This is reinforced by OECD (2004):

Corporate governance involves a set of relationships between a company's management, its board, its shareholders and other stakeholders. Corporate governance also provides the structure through which the objectives of the company are set, and the means of attaining those objectives and monitoring performance are determined. Good corporate governance should provide proper incentives for the board and management to pursue objectives that are in the interests of the company and its shareholders and should facilitate effective monitoring.

The difference between management and governance highlighted by the above definitions is quite clear. The governance system defines the structures used by the organization, allocates rights and responsibilities within those structures and requires assurance that management is operating effectively and properly within the defined structures. The role of management is to manage the organization within the framework defined by the governance system; this applies particularly to the governance and management of projects.

#### 2.2 Governance in multi projects context

In the quest to create value, organizations make decisions through altering strategic direction, developing new products, enhancing capacity or introducing new technology that will improve the efficiency and competitive position (Dooley et al., 2005). Project management techniques have frequently been applied to the tasks of planning and implementing necessary operational changes (Turner and Muller, 2003).

Before continuing with this section it is necessary to provide some definitions of 'project', 'programme', 'portfolio' and 'value' as a consistent basis of the discussion. A project is 'a temporary endeavor undertaken to create a unique product services or result' (PMI, 2013). Project management is the application of knowledge, skills, tools, and techniques to project activities to meet the project

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requirements (PMI, 2013 p.4). Programme has been defined by the Association of Project Management (APM) as a group of related projects that together achieve a beneficial change of a strategic nature for an organization (APM, 2006 p.14). The definition of portfolio also reflects this notion of change as the totality of an organization's investment in the changes required to achieve its strategic objectives OGC (Office of Government Commerce, 2007a). All three levels of specialized management - project, programme and portfolio - can be considered through application of these definitions to be mechanisms for implementing changes to meet the organization's strategic goals and realize value.

Value itself is a less tangible concept as shown in Figure 2 and has a wider interpretation. Value is achieved when the project's output (product, service or result) is used by the organization to generate the intended outcomes, and the outcomes enable the realization of a range of expected and other benefits (Jenner, 2012 p.17). Then, if the tangible and intangible benefits exceed the input costs associated with both the project and the organizational change initiative and the final organizational outcomes support the overall strategy, delivering strategic or tactical advantage to the organization or to helping the bottom line, 'value' has been created<sup>4</sup>.



Fig. 2. The value chain.

The authors suggest that Project, Program and Portfolio (PPP) governance (sometimes called 'project governance' for convenience) is the sub-set of corporate governance under the 'change' petal as illustrated in Figure 1. The focus is on assisting, and ensuring, that the projects and programs undertaken to effect change deliver the maximum value to the organization. In this context, 'project governance' is a subset of corporate governance (Marnewick and Labuschagne, 2011) where it focuses on areas of corporate governance that relate to programme and project activities (APM, 2011; Crawford et al., 2008; Turner, 2006; Williams et al., 2010).

Project governance has only recently become an important issue in the project management community and literature (Miller and Hobbs, 2005). Publications discussing governance in the project contexts can be classified into two main groups. Firstly, research and publication in the field of project governance that focused mainly on public sector and large projects (e.g. see Crawford and Helm, 2009; Du and Yin, 2010; Klakegg et al., 2008; Miller and Hobbs, 2005; Williams et al., 2010). Among these publications, many consider project governance for large multi-firm projects as contract

<sup>&</sup>lt;sup>4</sup> For more on benefits and value see: *WP1023 Benefits and Value*: <u>https://mosaicprojects.com.au/WhitePapers/WP1023 Benefits and Value.pdf</u>

organizations (Miller and Hobbs, 2005; Sanderson, 2012; Turner and Keegan, 2001; Winch, 2001). Others view project governance as a nexus of treaties involving several actors interconnected via inter-organizational relationships and network (Clegg et al., 2002; Henisz et al., 2012; Klijn, 2008; Reve and Levitt, 1984; Ruuska et al., 2011; Turner and Simister, 2001; Winch, 2006). The second group examines governance models linking different project related levels (e.g. project management, program management and portfolio management) within an organization (Dooley et al., 2005; Elonen and Artto, 2003; Muller, 2009). This management framework is frequently being described as either 'enterprise' or 'strategic' project management. More recently, several standards and guides have been developed to further address the project governance models in enterprise project management. These standards (see Appendix 2) were issued by organizations such as the Deutsches Institut für Normung (DIN), the UK Office of Government Commerce, the Project Management Institute and the Association of Project Management.

Despite the emerging research and increase in publications in the area of project governance related to enterprise project management, the approach to project governance adopted to date emphasizes the development of good governance structure and processes. However, governance structures and processes are merely the mechanisms needed to achieve good governance; they do not represent good governance (Knodel, 2004; Peterson et al., 2002). Hence current project governance model has a couple of shortcoming that can results in creating a fundamental conflict of interest.

Firstly, there is a conflict between roles of managing the portfolio effectively and supporting projects to meet their objectives. There is an argument that the main goal of project governance is the creation of accountability frameworks (Knodel, 2004; Ross and Weill, 2002). However, creating more visibility and accountability usually increases fear and resistance for everyone and thus in practice accountability is a cause for frustration for managers and frequently generates confusion within organizations (Keyes-Pearce, 2002; Knodel, 2004). An example of this conflict of interest is the incompatibility between the role of portfolio management that involves selecting and rejecting projects to meet the requirements of the organization's strategic plan and the conflicting role of nurturing and supporting the same projects to help their teams deliver benefits to the organization and other stakeholders. There is a need to have a clear delineation between these two important functions: the same entity cannot have the accountability to cancel unsuccessful projects and at the same time provide support to the project to help it achieve its objectives.

Secondly, the concept that 'project governance' is somehow special and a function of middle level manager can also result in conflict of interest. This threat comes from middle management's generally held misconception that governance is focused on due process and control. Peterson et al. (2002) argued that a focus on tools and frameworks is insufficient to guarantee effective project governance. For example, many organizations appoint a project sponsor or Project Control Board (PCB) as a 'governance' agent and the focus will be on ensuring the project manager follows 'due process'. The limitation of this approach is the risk that, if this due process is followed, the sponsor or PCB may consider that all 'governance' responsibilities have been met – and that someone else – typically the project manager – has the responsibility to ensure that the project meets its objectives. The conflict occurs when the same people have an organizational responsibility for ensuring the achievement of the stated outcomes and a responsibility for over-sighting the same processes. In such circumstances, it will be difficult for this management group to maintain a balanced perspective in their decision-making.

The limitations discussed above indicate the need to have clear delineation of roles and relationship between governance and management. Good project governance for the enterprise project management is, therefore, a system of appropriate checks and balances that enables transparency, accountability and defined roles (Muller, 2009) while at the same time supporting the efforts of project and program managers in delivering their project in support of organizational objectives. Having defined the limitations of current thinking it is now necessary to define the type of relationship between governance and management that enhances the strategic, operational and tactical activities and decisions of all those in the accountability framework for governance in all its various guises.

#### 2.3 The relationship between Governance and Management

Both governance and management are hierarchal systems, the people at the top of the system delegate authority and responsibility for defined actions to people lower in the hierarchy and use surveillance and assurance processes to ensure these delegations are being exercised properly. Therefore, the concept of delegation is a key principle in managing governance and can be summed up in the legal doctrine 'delegatus non potest delegare'... unless expressly authorized a delegate cannot delegate to someone else, and the delegation of responsibility does not transfer accountability (Law and Martin, 2009). Accountability for the governance of the organization, the design of the governance system and the monitoring of the performance of the management system remain with the board of the host organization. This means a key part of the governing board's responsibility is to ensure the right people are employed in the organization's management structure so that appropriate delegations of authority can be made to competent managers. Then ensuring the managers develop an effective system of management that meets the governance needs of the organization.

If the organization is focused on developing and implementing systems to ensure that the 'right' projects and programmes are selected and funded, it seems logical that these selected 'few' would be accomplished more efficiently (APM, 2011). Achieving this goal involves setting the 'right objectives', and asking the 'right questions' to ensure that the governing board is confident the organization's management is making the best use of the resources assigned to undertake projects and programs. The 'questions' as defined in '*Directing Change: A guide to governance of project management*' by APM (2011) will be a strong basis for the governing board to assure themselves that the management structures are capable, effective and honest. The 'questions' also serve to ensure that resources deployed by management generate support for the long, medium and short-term objectives defined in the organization's strategy. Management's role in this context is to understand the Board's strategy and objectives and develop systems that are capable of offering effective 'answers' to both sets of questions as well as providing advice and recommendations for improvements.

Governance is not management, and the functions must be separated<sup>5</sup> (Letza, Sun, and Kirkbride, 2004; Shleifer and Vishny, 1997) The IT Governance Institute (ITGI) reiterates a need to have a clear separation of managerial powers where the Board is responsible for setting strategic objectives and executive managers are responsible for establishing performance measures (Guldentops et al., 2001). From this background of research, papers and directives from institutes and professional bodies, the authors propose the relationship between governance, organizational management and project management as a series of nested systems, described in detail in Figure 3 below.

<sup>&</sup>lt;sup>5</sup> The 'five functions of management' were defined by Henri Fayol in 1916, see *WP1094 The Functions of Management*: <u>https://mosaicprojects.com.au/WhitePapers/WP1094\_Defining\_Management.pdf</u>

The 'six functions of governance' have been proposed by Dr. Lynda Bourne see *WP1096 The Functions of Governance*: https://mosaicprojects.com.au/WhitePapers/WP1096 Six Functions Governance.pdf



Fig. 3. Nested governance and management systems.

The degree of involvement in the creation of each system and system decision-making generally reduces at lower levels of management (represented by the reducing width of the exposed horizontal colored band at lower levels), however each of the lower systems is a part of the higher systems and managers operating in the lower level systems are required to conform to the objectives and requirements of each higher system. The Governance System is responsible for setting strategy and ensuring resources are used effectively. Success is heavily reliant on the organization's management system: the Board may have some involvement in the management processes, such as approving very large projects. The Management System manages the entire organization within the governance framework. Executive management is responsible for creating an organization capable of achieving the objectives defined by the governance system. They also have responsibility for providing assurances to the governance system that resources of all types are being effectively and ethically used. Middle and front line managers are responsible for implementing the work.

The Project Delivery System is a sub-set of the overall management system. This specialized area of 'enterprise project management' is responsible for all aspects of the 'management of project management' and the organization's capability to deliver projects successfully<sup>6</sup> including the portfolio management sub-system and the organizational change sub-system. A core component of the Project Delivery System is the individual Project Management Systems (and Program Management Systems), where each of the individual systems are responsible for creating the 'deliverables' the project or programme was initiated to 'deliver', thus enabling the organization's management to make effective use of, and generate value as it has been defined in each instance.

<sup>&</sup>lt;sup>6</sup> For more on project delivery capabilities (PDC) see *WP1079 The Strategic Management of Projects*: <u>https://mosaicprojects.com.au/WhitePapers/WP1079 PDC.pdf</u>

The hypothesis described by Figure 3 suggests that a good project governance system provides direction to, and needs support from the management system. In turn, the management system provides support to, and needs deliverables from the project delivery system. More research is needed to support this hypothesis and there are significant gaps in the literature related to governance in managing multi-projects, particularly in defining and providing support for processes to translate governance from corporate level down to the project level. The conceptual framework needed to allow an organization to manage the nested systems described above, and in particular to deal with the challenges of simultaneously managing multiple individual project and programme systems (each with their own unique set of objectives) is discussed below.

# **3.0 Conceptual Framework**

To manage multiple projects successfully the organization needs to maintain control over a varied range of specialist projects, balance often conflicting requirements with limited resources, and coordinate the project portfolio to ensure optimum organizational outcome is achieved (Dooley et al. (2005). Many researchers (Elonen and Artto, 2003; Platje et al., 1994b; Turner and Speiser, 1992) have investigated the management of multiple projects and found that projects have interfaces with other projects and day-to-day operations, sharing common deliverables, resources, information or technology across those interfaces. This will require the managers of these projects to negotiate priority of resources on an almost daily basis with other projects and day-to-day operations, particularly because these projects will usually deliver related objectives, contributing to the overall development objectives of the parent organization.

The above discussion suggests that project governance in a multi-project environment has two key functions. The first function is a decision about which projects the organization should approve, fund and support. These governance decisions are then communicated to management for implementation. The primary outputs from this part of the project governance system are: specifications about the rights and responsibilities of participants in the projects (stakeholders); definitions of (and agreement for) rules and procedures for making decisions; development of the strategic framework for selection of the 'right' projects and programmes to undertake – including a clear understanding of what 'right' means for every organization; and finally mechanisms for the efficient and effective use of resources.

The second function of the project governance system is the oversight and assurance. These functions include: agreeing the current strategic plan (in conjunction with executive management) and how the projects approved within that strategy contribute to the organization strategic objectives; modification of the strategic plan in response to changing circumstances; monitoring performance of the projects within the strategic plan and the stewardship (effective management) of resources applied to these projects; communication of these assurances appropriate external stakeholders, the organization's owners, and the wider stakeholder community (including regulatory authorities).

It is clear that the project governance system cannot operate without the effective support of the organization's management system. In this context, the role of management is the mirror image of governance. The primary role of management is to make decisions within the framework set by the governing body to achieve the objectives, also set by the governing body. The primary output from management is information and instructions that have to be communicated to others - to the workers informing them of the requirements for production and to the governing body to assure it that the right decisions have been made and the right things are being produced in the right ways.

Managing multiple projects effectively through a framework as described in Figure 4 not only provides a mechanism for evaluating prospective projects but also for their continuous review in the context if their suitability to the current environment and relative to other projects in the portfolio. This process ensures that the organization's portfolio represents the correct (and strategic) mix and type of projects at any time (Dooley et al., 2005).



Fig. 4. The project governance framework.

The shaded boxes in Figure 4 illustrate four key interrelated elements to support effective governance of projects and programs. The elements are Portfolio Management; Project Sponsors; Strategic PMO and Effective Projects and Programs Management. The following sub-sections will discuss each of these four elements.

#### 3.1 Portfolio Management

Portfolio management<sup>7</sup> has been defined as the governance structure adopted to minimize the overall costs of converting 'input' to 'output' through projects (Blomquist and Müller, 2006). Portfolio management focuses on selecting the right projects and programmes to maintain or start, and which to defer or cancel (Levine and Wideman, 2005) in order to minimize the transaction costs, which are the sum of all costs for implementing and governing projects (Williamson, 1985). Elonen and Artto (2003) identified five major types of problems that could occur in project portfolio management:

- (1) Projects overlapping both within one portfolio and between portfolios;
- (2) Results of the projects are not integrated into each other;
- (3) Decisions made about projects often didn't consider available resources, the priority of the project, or whether a project should be discontinued although new projects are continually added to the list of active projects;
- (4) Roles and the responsibilities of decision makers were not clear or fully understood;

<sup>&</sup>lt;sup>7</sup> For more on *portfolio management* see: <u>https://mosaicprojects.com.au/WhitePapers/WP1017\_Portfolios.pdf</u>

- (5) Feedback from the portfolio level to the project level is often missing or minimal; and finally,
- (6) A reluctance to stop projects even when it is clearly to the advantage of the organization to do so.

From this research effective project governance systems or frameworks have mechanisms in place to achieve longer-term strategies whilst maintaining current operations (Elonen and Artto, 2003). The mechanisms include terminating projects that no longer contribute to the organization's strategic plan and reallocation of resources to activities that *do* contribute to the strategic plan (Cooper et al., 2000; Meskendahl, 2010). Portfolio management thus supports the organization's strategy (Artto et al., 2008; Klakegg et al., 2008; Muller, 2009; Unger et al., 2012a)

Project Portfolio Management can support the overall governance processes by balancing the workload against the organization's capability and capacity to undertake the work; ensuring an appropriate mix of high risk high return projects that create the 'future organization' compared to safe or essential projects with a short payback period; ensuring the information needed to allow a proper decision to be made is developed and that the degree of uncertainty (risk) involved in the assessments is understood and is acceptable to the organization when balanced against the anticipated benefits.

In addition, some governance processes may be delegated to the Portfolio Management team including: developing processes to ensure decisions are in alignment with the organization's strategy and overall governance framework; providing feedback to the strategic decision makers and governing body based on the 'special knowledge' gained through effective portfolio management activities; and determining the criteria and methods to be used in the selection, oversight and termination of projects and programs.

In summary, as part of the total governance system, the portfolio management functions consist of gathering and validation of capability and resource availability data; applying the policies, procedures, methods and criteria to make and implement effective decisions; and the continuous review and 'learning' associated with a continuous improvement philosophy in the portfolio domain. Delivering the selected projects becomes an accountability of the project sponsor.

## 3.2 Project Sponsors

Effective project management includes clearly defined objectives and goals, as well as agreement between the client (organization) and project manager on how they will achieve these goals and objectives. It is important that the means of achieving these goals and objectives are aligned with the organization, as this would impact the support received from the organization (Jang and Lee, 1998). The success or failure of projects is, therefore, dependent on the top management support (Lechler and Cohen, 2009; Unger et al., 2012b; Young and Jordan, 2008). In a major study in the management of large complex projects, Miller and Hobbs (2002) showed that the capabilities of the project sponsor has an important impact on project performance. As such, the project sponsor<sup>8</sup> is a critical link between the executive and strategic levels of the organization and the effective delivery of the benefits the project/program was created to facilitate.

The view of projects as temporary organizations established within the framework of the permanent organization (Lundin and Soderholm, 1995; Sahlin-Anderson and Soderholm, 2002; Turner and Muller, 2003; Young et al., 2012) highlights this issue. Temporary organisations do not have existing

<sup>&</sup>lt;sup>8</sup> For more on the *role of a sponsor* see:

https://mosaicprojects.com.au/WhitePapers/WP1031 Project Sponsorship.pdf

links into the overall organisational structure; each connection has to be created from 'new' and the sponsor has a key role to play in this process. The permanent organization is required to conform to corporate governance requirements through established channels and structures but these cannot exist for a new temporary organization. Therefore to satisfy corporate governance requirements, management must ensure coordination between governance of the permanent and temporary organizations (Crawford et al., 2008); and the project sponsor is a key link in management systems that support good governance.

A project sponsor represents the client and acts in the interest of the commissioning (client) organization in the day to day management of the project (Hall et al., 2003). The sponsor is responsible for activities that span the whole of the project life cycle: defining business requirements, establishing a project strategy with priorities, agreeing the project definition including objectives, defining project success criteria, ongoing monitoring of the project's business environment and of benefit realization, taking delivery of a project at completion (APM, 2006; Briner et al., 1999; Field and Keller, 1998; Hall et al., 2003; Kliem and Ludin, 1992; Morris, 1994; Turner, 2009). This means the sponsor is accountable to higher-level management for directing the project with a 'cradle to grave' responsibility to ensure that the benefits for the organization are realized. This includes ensuring that the project always makes sound business sense, approving key deliverables and making decisions or recommendations at critical points in the project's life as required in the project management plan. However, the function can be confused and challenging, in practice, to those involved and to those interfacing with it (Sense, 2013), so roles and responsibilities of project sponsor need to be clearly delineated.

The project sponsor can support project governance in two broad perspectives. The first is an external focus, concentrating on the project from the viewpoint of the client (Bryde, 2008) in defining the business benefits, monitoring the business environment and benefits realization. This is the act of governing the project and requires that the project be looked at from the perspective of the parent organization (Crawford et al., 2008). The second role is more internal focus, provides the project manager and the project team with support to fulfill their role effectively (Wright, 1997). The sponsor role in this instance is to act as providing top management support and requires looking at the parent organization from the perspective of the project support. Hence, the project sponsor role can be described as bridging governance and support functions (Crawford et al., 2008).

In summary, the governance processes that may be delegated to a project sponsor include firstly, developing processes to ensure decisions are in alignment with the organization's strategy and overall governance framework. Second, providing feedback to the strategic decision makers and governing body based on the 'special knowledge' gained through effective sponsorship activities. Third, determining the criteria and methods to be used in the directing and supporting of the projects and programs being sponsored.

The sponsor's management functions include the work of applying the policies, procedures and methods to make and implement effective decisions, that support the work of the project or program and maximize the value achieved by the organization from its investment.

## 3.3 Strategic Project Management Office

The emerging importance of the Project Management Office (PMO) is associated with the increasing number and complexity of projects throughout the business world and the attempts at efficiency through centralization of support and control of the projects (Marsh, 2000). The responsibilities of the PMO can range from providing project management support functions to actually being responsible for the direct management of a project (Aubry et al., 2007). The contribution of the PMO is linked to provision of internal consulting experience, project management knowledge, and application of a clear set of project process performance standards for project (and programme) work. With the

growth of multi-project management environments, multi-project or strategic PMOs have emerged to develop competence in project management, manage single project performance and coordinate multiple projects (Hurt and Thomas, 2009; Pellegrinelli and Garagna, 2009; Unger et al., 2012a). Interest and scholarship in PMOs has intensified, with Hobbs and Aubry (2011) and Muller et al. (2011) proposing typologies of PMOs. In general, however, the understanding of PMOs' roles and the impact of these roles on value contribution and creation remains unclear (Unger et al., 2012a)<sup>9</sup>.

Kerzner (2003) reviewed the roles and benefits of the PMOs over several decades concluding that expectations of PMOs has shifted towards multi-project management, standardization of operations, emphasis on organization; moving from the earlier focus on silo decision making, providing efficiencies through faster and more consistent access to higher quality information, more realistic prioritization of work, fewer meetings, and more efficient and effective operations. Specifically, Hobbs and Aubry (2010) emphasize the importance of the PMOs monitoring and controlling of project performance function.

PMOs have a critical governance support role to ensure that accurate information is available to executive management, thus maintaining visibility and control on the performance and trends of the projects and programmes for which they are responsible. A successful PMO includes sufficient discipline and rigor in their processes to achieve the reporting accuracy needed; but at the same time supports the level of development and innovation that allows the organization to achieve its strategic. An effective PMO supports good project governance by firstly, ensuring the information in their reports is useful, relevant, accurate and complete; and secondly providing interpretive and predictive assessments to senior management to support the portfolio management decision making process.

To summarize: governance functions of a strategic PMO focus on developing a structure that balances the competing needs discussed above and that conforms to the overall organizational governance framework; management functions are associated with the work of gathering, consolidating and disseminating information and advice.

## 3.4 Effectiveness of project and program management

Projects and programmes are created to deliver the change needed to achieve the organization's strategic and tactical objectives. Management 'by project' is fundamental to support, sustain and grow the business (Rezania and Lingham, 2009). The obligation of project and programme managers is to create the outputs and deliverables as efficiently as possible, while working ethically and in accord with the organization's practices and procedures. Elonen and Artto (2003) found that the major problems in project activities were: improper implementation of the pre-project phase; infrequent project progress monitoring; and excessively lengthy projects that are difficult to plan realistically in detail. Atkinson et al. (2006 p.691) suggest, 'the whole raison d'etre of project management is to remove (or substantially reduce) uncertainty about meeting specified objectives.' Performance problems are an almost inevitable result of the organizational complexity, ambiguity and conflict facing projects on a day-to-day basis (Atkinson et al., 2006; Clegg et al., 2002; van Marrewijk et al., 2008).

There is a link between the governance principles on a high level and lower levels, and a link between internal processes (company, projects) and its surroundings (such as the sector, the industry.) (Winch, 2001). In other words, project governance defines the space in which day to day project activities

<sup>&</sup>lt;sup>9</sup> For more on *PMOs* see:

https://mosaicprojects.com.au/WhitePapers/WP1034\_PMOs.pdf

occur (Patel, 2007). Three key areas need to be considered. Firstly, to ensure that the appropriate project organization is in place and formally documented to undertake the project (Marnewick and Labuschagne, 2011). All projects should have people identified and held responsible for: governing the project to ensure that managerial and technical oversight is maintained; sponsoring the project in pursuit of stated organizational needs or objectives; and managing the project on a day-to-day basis, ensuring that the deliverables are appropriate to the delivery of the desired outcomes.

The second consideration is for decision makers at each level to be accountable to higher-level management for key decisions relating to the project. Decision makers can be individuals or groups of people (boards) with the appropriate level of authority, skills and knowledge. The levels of authority and constituency of any decision-making body will normally be defined within the governance arrangements or schemes of delegation of the sponsoring organization. For projects, governance is typically required for: authorizing the start of projects and each phase of a project; authorizing changes to the project; and ensuring compliance with the organization's policies and any applicable legal or regulatory requirements.

The third consideration refers to regulation of the quality of any outputs, including the application of any organizational constraints, such as standards and components to be used and supported by an appropriate assurance system. Assurance activities include recommending to the project sponsor that reviews or audits should be held and checking the following: that user needs and expectations are being met or managed; that risks are being controlled; that plans are realistic and achievable; that the right people are being involved; that an acceptable solution is being developed; that the programme/ project is not growing unnoticed; that any legislative, regulatory or contractual requirements are being met; and that the needs of stakeholders are being respected.

In short, if the governance system is working effectively the organization's projects and programs will be managed effectively<sup>10</sup>. However, the governance functions that may be delegated to a project or programme manager are quite limited, and are focused compliance with the organization's overall ethical and governance framework within the broader project team. The roles are primarily management and the functions are largely defined in the various project and programme management standards.

# 4. Conclusions

The concept of project management is well defined and understood. Martin Cobb (1995) stated: "We know why projects fail; we know how to prevent their failure—so why do they still fail?". The authors assert that systemic project failure is a failure of organizational governance. The art of good governance is striking the right balance between restrictive processes to prevent malfeasance, and allowing management the freedom to support effective growth and innovation thus facilitating the achievement of strategic goals of the organization.

The purpose of this paper has been to address the differences between governance and management and the functions of each within the overall ambit of 'project management' and organizational governance that are currently lacking definition, academic study and understanding by the general

<sup>&</sup>lt;sup>10</sup> For more on an organisation's overall *strategic project delivery capability* see: <u>https://mosaicprojects.com.au/WhitePapers/WP1079\_PDC.pdf</u>

management community. This study has drawn upon the current knowledge base in project management and attempted to extend understanding by synthesizing the procedures and standards developed by professional and government bodies to produce an integrated project governance framework with clear delineation of roles between governance and management in four key elements. The four elements are:

- (1) Portfolio management; focused on selecting the right projects and programs to undertake in support of the strategy, and terminating ones that no longer contribute value to the organization;
- (2) Project sponsorship; providing the direct link between the executive and the project or program manager, focused on the whole project lifecycle leading to the delivery of value;
- (3) PMOs; providing oversight and strategic reporting capabilities;
- (4) Projects and programmes; highlighting that effective management of projects and programs is the measure of an effective governance system.

Good project governance is therefore about achieving optimal balance between these four elements within each organization. This requires management to invest in the development of effective capabilities to deliver these functions and 'asking the right questions'. A framework that considers these key elements can serve as a powerful management tool for organizations to improve the performance of their projects.

This framework can be adopted by organizations to achieve effective project outcomes and create business value because:

- (1) It is a holistic process focused on the creation of sustainable value by the organization. Authority for some aspects of governance can be delegated to management, but accountability remains with the governing board.
- (2) Governance and management must be separate; importantly a manager cannot govern his/her own work.
- (3) The governance structure is defined by the governing board and implemented by management.
- (4) A core aspect of good governance is making the decisions to invest in developing the appropriate management capabilities to ensure organizational resources are used efficiently and effectively.

As more and more organizations are expected to manage multiple projects to achieve competitive advantage, executive, management and project practitioners will be looking to academic institutions, government and professional bodies and the experience of practitioners in the field to lead the way in developing more effective and efficient governance frameworks. The conceptual framework described in this paper is offered as a foundation template to be tested empirically in future research. These studies can then develop a more comprehensive framework that improves the success rate of projects and programmes, but more importantly, to enable organizations to act decisively, ethically and comprehensively by using a project approach to deliver benefits to the organization and its stakeholders.

#### References

Abednego, M.P., Ogunlana, S.O., 2006. Good project governance for proper risk allocation in publicprivate partnerships in Indonesia. International Journal of Project Management, 24, 622-634.

APM, 2006. Project Management Body of Knowledge, 5th ed. Association of Project Management, High Wycombe.

APM, 2011. Directing change: A guide to governance of project management. Association for Project Management, UK.

Artto, K.A., Kujala, J., Dietrich, P., Martinsuo, M., 2008. What is project strategy? International Journal of Project Management, 26, 4-12.

AS8015, 2005. Corporate governance of information and communication technology. Standards Association of Australia, Sydney.

AS8016, 2010. Corporate governance of projects involving IT investments. Standards Assiciation of Australia, Sydney.

Atkinson, R., Crawford, L.H., Ward, S., 2006. Fundamental uncertainties in projects and the scope of project management. International Journal of Project Management, 24, 687-698.

Aubry, M., Hobbs, B., Thuillier, D., 2007. A new framework for understanding organisational project management through the PMO. International Journal of Project Management, 25, 328-336.

Australian Institute of Company Directors, 2010. Company Directors Corporate Governance Framework. Australian Institute of Company Directors, Sydney.

Blau, P.M., Schoenherr, R.A., 1971. The structure of organizations. Basic Books, New York.

Blomquist, T., Müller, R., 2006. PRACTICES, ROLES, AND RESPONSIBILITIES OF MIDDLE MANAGERS IN PROGRAM AND PORTFOLIO MANAGEMENT. Project Management Journal, 37, 52-66.

Briner, W., Hastings, C., Geddes, M., 1999. Project leadership, 2nd ed. Gower, Aldershot.

Bryde, D., 2008. Perceptions of the impact of project sponsorship practices on project success. International Journal of Project Management, 26, 800-809.

Clegg, S.R., Pitsis, T.S., Rura-Polley, T., Marosszeky, M., 2002. Governmentality Matters: Designing an Alliance Culture of Inter-organizational Collaboration for Managing Projects. Organization Studies (Walter de Gruyter GmbH & Co. KG.), 23, 317.

Cobb, M., 1995. Unfinished Voyages, Presentation at Tha CHAOS University, sponsored by The Standish Group, Chatham. MA.

Cooper, R.G., Edgett, S.J., Klienschmidt, E.J., 2000. New problems, new solutions: making porfolio management more effective. Research Technology Management, 43, 18-33.

Crawford, L., Cooke-Davies, T., Hobbs, B., Labuschagne, L., Remington, K., Ping, C., 2008. Governance and support in the sponsoring of projects and programs. Project Management Journal, 39, S43-S55.

Crawford, L.H., Helm, J., 2009. Government and governance: the value of project management in the public sector. Project Management Journal, 40, 73-87.

DIN, 2013. Multi Project Management - Management of project portfolios, programmes and projects - Part 1: Fundamentals. Deutsches Institut für Normung, Berlin.

Dooley, L., Lupton, G., O'Sullivan, D., 2005. Multiple project management: A modern competitive necessity. Journal of Manufacturing Technology, 16, 466-482.

Du, Y., Yin, Y., 2010. Governance-Management-Performance (GMP) framework: A fundamental thinking for improving the management performance of public projects. iBusiness, 2, 282-294.

International Journal of Project Management (2014) Volume 32, Issue 8, November 2014, Pages 1382–1394. http://www.sciencedirect.com/science/article/pii/S026378631300094X

Elonen, S., Artto, K.A., 2003. Problems in managing internal development projects in multi-projects environments. International Journal of Project Management, 21, 395-402.

Eskerod, P., Riis, E., 2009. Project management models as value creators. Project Management Journal, 40, 4-18.

Field, M., Keller, L., 1998. Project Management. The Open University, London.

Galbraith, J.R., 1967. Designing complex organizations. Addison-Wesley, Reading, MA.

Ghosh, S., Amaya, L., Skibniewski, M.J., 2012. Identifying areas of knowledge governance for successful projects. Journal of Civil Engineering & Management, 18, 495-504.

Governance, C.o.t.F.A.o.C., 1992. Report with Code of best Practice [Cadbury Report]. Gee Publishing, London.

Guldentops, E., Lainhart, J.W., Hardy, G., Schuermans, E., 2001. Board briefing on IT governance. IT Governance Institute of the Information Systems Audit and Control Foundation, Rolling Meadows, IL, USA.

Hall, M., Holt, R., Purchase, D., 2003. Project sponsors under New Public Management: lessons from the frontline. International Journal of Project Management, 21, 495-502.

Henisz, W.J., Levitt, R.E., Scott, W.R., 2012. Toward a unified theory of project governance: economic, sociological and psychological supports for relational contracting. Engineering Project Organization Journal, 2, 37-55.

Hobbs, B., Aubry, M., 2010. The project management office (PMO): a quest for understanding. Project Management Institute, Books24x7.

Hobbs, B., Aubry, M., 2011. A typology of PMOs derived using cluster analysis and the relationship with performance, International Research Network on Organizing by Projects, Montreal, Canada.

Hurt, M., Thomas, J.L., 2009. Building value through sustainable project management offices. Project Management Journal, 40, 55-72.

Institute of Directors Southern Africa, 2009. King Code of Governance for South Africa 2009, Johannesburg.

Jang, Y., Lee, J., 1998. Factors influencing the success of management consulting projects. International Journal of Project Management, 16, 67-72.

Jenner, S., 2012. A Senior Manager's Guide to Managing Benefits. The Stationery Office, Norwich, UK.

Kerzner, H., 2003. Strategic planning for a project office. Project Management Journal, 34, 13-25.

Keyes-Pearce, S.V., 2002. Rethinking the importance of IT Governance in the e-world, 6th Pacific Asia Conference on Information Systems, Tokyo, Japan, pp. 256-272.

Klakegg, O.J., Williams, T., Magnussen, O.M., Glasspool, H., 2008. Governance frameworks for public project development and estimation. Project Management Journal, 39, S27-S42.

Kliem, R.L., Ludin, I.S., 1992. The people side of project management. Gower, Aldershot.

Klijn, E.-H., 2008. Governance and governance networks in Europe. Public Management Review, 10, 505-525.

Knodel, T., 2004. Preparing the organizational 'soil' for measurable and sustainable change: business value management and project governance. Journal of Change Management, 4, 45-62.

Law, J., Martin, E., 2009. A Dictionary of Law, Oxford Dictionary of Law, 7th ed. Oxford University Press, Oxford.

Lawrence, P.R., Lorsch, J.W., 1969. Organization and Environment. Richard D Irwin, Homewood, IL.

Lechler, T.G., Cohen, M., 2009. Exploring the role of steering committees in realizing value from project management. Project Management Journal, 40, 42-54.

Levine, H.A., Wideman, M., 2005. Project Portfolio management: a practical guide to selecting projects. Jossey-Bass, Hoboken.

Lundin, R.A., Soderholm, A., 1995. A theory of temporary organization. Scandinavian Journal of Management, 11, 437-455.

Marnewick, C., Labuschagne, L., 2008. The substantiation of the vision-to-projects (V2P) framework through action research, in: Andrews, E.J. (Ed.), PMI Research Conference: Defining the future of project management. Project Management Institute, Warsaw, Poland.

Marnewick, C., Labuschagne, L., 2011. An investigation into the governance of information technology projects in South Africa. International Journal of Project Management, 29, 661-670.

Marsh, D., 2000. The programme and project support office, in: Turner, R.J., Simister, S.J. (Eds.), Handbook of project management. Gower, Aldershot, England, pp. 131-144.

Martin, N., Gregor, S., 2006. ICT governance. Journal of E-Government, 2, 19-49.

Meskendahl, S., 2010. The influence of business strategy on project portfolio management and its success — A conceptual framework. International Journal of Project Management, 28, 807-817.

Miller, R., Hobbs, B., 2002. A framework for analyzing the development and delivery of large capital projects, in: Slevin, D., Cleland, D.I., Pinto, J. (Eds.), The frontiers of project management research. Project Management Institute, Newton Square, PA.

Miller, R., Hobbs, B., 2005. Governance regimes for large complex projects. Project Management Journal, 36, 42-50.

Miller, R., Lessard, D.R., 2000. The strategic management of large engineering projects: Shaping institutions, risk and

governance. MIT Press, Cambridge, MA.

Milosevic, D.Z., Srivannaboon, S., 2006. A theoretical framework for aligning project management with business strategy. Project Management Journal, 37, 98-110.

Mittal, B., Sheth, J.N., 2001. Value space: Winning the battle for market leadership. McGraw-Hill, New York, NY.

Morris, P.W.G., 1994. The management of projects. Thomas Telford, London.

Muller, R., 2009. Project governance. Gower, London.

Muller, R., Aubry, M., Gluckler, J., 2011. A relational typology of project management offices, International Research Network on Organizing by Projects, Montreal, Canada.

OECD, 2004. OECD principles of corporate governance 2004. OECD Publication Services, Paris.

Office of Government Commerce, 2007a. Management of Portfolios. The Stationery Office, London.

Office of Government Commerce, 2007b. Managing successful programmes, 3rd ed. The Stationery Office, London.

Office of Government Commerce, 2009. Managing successful projects with PRINCE2. The Stationery Office, London.

Patel, D., 2007. Why executives should care about project governace; What your peers are doing about it. PM World Today, 9.

Payne, A., Holt, S., 2001. Diagnosing customer value: integrating the value process and relationship marketing. British Journal of Management, 12, 159-182.

Pellegrinelli, S., Garagna, L., 2009. Towards a conceptualisation of PMOs as agents and subjects of change and renewal. International Journal of Project Management, 27, 649-656.

Pemsel, S., Müller, R., 2012. The governance of knowledge in project-based organizations. International Journal of Project Management, 30, 865-876.

Peterson, R.K., Parker, M.M., Ribbers, P.M.A., 2002. Information technology governance process under environmental process dynamism: Investigating competing theories of decision making and knowledge sharing, Tenty-third International Conference on Information Systems Barcelona, Spain, pp. 563-576.

Platje, A., Harald, S., Wadman, S., 1994a. Project and portfolioplanning cycle: project-based management for the multiproject challenge. International Journal of Project Management, 12, 100-106.

Platje, A., Seidel, H., Wadman, S., 1994b. Project and portfolio planning cycle: Project-based management for the multiproject challenge. International Journal of Project Management, 12, 100-106.

PMI, 2013. A Guide to the Project Management Body of Knowledge 5th Ed. Project Management Institute, Newton Square, PA

Reve, T., Levitt, R., 1984. Organization and governance in construction. Project Management Journal, 2, 17-25.

Rezania, D., Lingham, T., 2009. Coaching IT project teams" A design toolkit. International Journal of Managing Projects in Business, 2, 577-590.

Ross, J., Weill, P., 2002. Six IT decisions your IT people shouldn't make. Harvard Business Review, November, 85-91.

Ruuska, I., Ahola, T., Artto, K., Locatelli, G., Mancini, M., 2011. A new governance approach for multifirm projects: Lessons from Olkiluoto 3 and Flamanville 3 nuclear power plant projects. International Journal of Project Management, 29, 647-660.

Sahlin-Anderson, K., Soderholm, A., 2002. Beyong project management: New perspectives on the temporary-permanent dilema. Liber, Stockholm.

Sanderson, J., 2012. Risk, uncertainty and governance in megaprojects: A critical discussion of alternative explanations. International Journal of Project Management, 30, 432-443.

Sargeant, R., 2010. Creating Value in Project Management Using PRINCE2. Queensland University of Technology, Brisbane.

Sense, A.J., 2013. A project sponsor's impact on practice-based learning within projects. International Journal of Project Management, 31, 264-271.

Sharma, D., Stone, M., Ekinci, Y., 2009. IT governance and project management: A qualitative study. Journal of Database Marketing & Customer Strategy Management, 16, 29-50.

Shenhar, A.J., 2004. Strategic Project Leadership® Toward a strategic approach to project management. R&D Management, 34, 569-578.

Sørensen, E., 2002. Democratic Theory and Network Governance. Administrative Theory and Praxis, 24, 693-720.

Thomas, J., Mullaly, M., 2007. Understanding the Value of Project Management: First Steps on an International Investigation in Search of Value. Project Management Journal, 38, 74-89.

Turner, J.R., 2006. Towards a theory of project management: The nature of the project governance and project management. International Journal of Project Management, 24, 93-95.

Turner, J.R., 2009. The handbook of project-based management: Leading strategic change in organizations, 3rd ed. McGraw-Hill, New York.

Turner, J.R., Keegan, A., 2001. Mechanisms of governance in the project-based organization: Roles of the broker and steward. European Management Journal, 19, 254-267.

Turner, J.R., Muller, R., 2003. On the nature of the project as a temporary organization. International Journal of Project Management, 21, 1-8.

Turner, J.R., Speiser, A., 1992. Programme management and its information system requirements. International Journal of Project Management, 10, 196-206.

Turner, R., Simister, S., 2001. Project contract management and a theory of organization. International Journal of Project Management, 19, 457-464.

Unger, B.N., Gemünden, H.G., Aubry, M., 2012a. The three roles of a project portfolio management office: Their impact on portfolio management execution and success. International Journal of Project Management, 30, 608-620.

Unger, B.N., Kock, A., Gemünden, H.G., Jonas, D., 2012b. Enforcing strategic fit of project portfolios by project termination: An empirical study on senior management involvement. International Journal of Project Management, 30, 675-685.

van Marrewijk, A., Clegg, S.R., Pitsis, T.S., Veenswijk, M., 2008. Managing public-private megaprojects: paradoxes, complexity and project design. International Journal of Project Management, 26, 591-600.

Weaver, P., 2012. The management of project management, The Australian Institute of Project Management National Conference 2012 "People, Places, Projects... A New Frontier", Melbourne.

Williams, T., Klakegg, O.J., Magnussen, O.M., Glasspool, H., 2010. An investigation of governance frameworks for public projects in Norway and the UK. International Journal of Project Management, 28, 40-50.

Williamson, O.E., 1985. The economic institutions of capitalism. The Free Press, New York.

Willson, P., Pollard, C., 2012. Exploring IT governance in theory and practice in a large multi-national organisation in Australia. Information Systems Management, 26, 98-109.

International Journal of Project Management (2014) Volume 32, Issue 8, November 2014, Pages 1382–1394. http://www.sciencedirect.com/science/article/pii/S026378631300094X

Winch, G., 2006. The governance of project coliations - towards a research agenda, in: Lowe, D., Leiringer, R. (Eds.), Commercial management of projects: Defining the discipline. Blackwell Publishing, UK, pp. 324-343.

Winch, G.M., 2001. Governing the project process: a conceptual framework. Construction Management and Economics, 19, 799-808.

Winter, M., Smith, C., Morris, P., Cicmil, S., 2006. Directions for future research in project management: The main findings of a UK government-funded research network. International Journal of Project Management, 24, 638-649.

Winter, M., Szczepanek, T., 2008. Projects and programmes as value creation processes: A new perspective and some practical implications. International Journal of Project Management, 26, 95-103.

Wright, N.J., 1997. Time and budget: the twin imperatives of a project sponsor. International Journal of Project Management, 15, 181-186.

Young, R., Jordan, E., 2008. Top management support: mantra or necessity? International Journal of Project Management, 26, 713-725.

Young, R., Young, M., Jordan, E., O'Connor, P., 2012. Is strategy being implemented through projects? Contrary evidence from a leader in new public management. International Journal of Project Management.

Zhai, L., Xin, Y., Cheng, C., 2009. Understanding the value of project management from a stakeholder's perspective: Case study of mega-project management. Project Management Journal, 40, 99-109.

## **Appendix 1**

The diagram in Figure 1 (below) is a synthesis of several sources and focuses on the aspects of governance that are associated with projects, programs and portfolios. The primary source is the Australian Institute of Company Directors (AICD) 'Company Directors Corporate Governance Framework<sup>TM</sup>' (below).

The 'petals' in Figure 1 seek to aggregate the various functions of governing the organization into the five main themes, whilst other aspects of governance such as the performance of the 'Board' and of individual directors have been largely omitted for clarity. The importance of these 'other' practices from the AICD perspective of developing the competence of directors is crucially important; the 'petal diagram' assumes competent directors and an effectively functioning board and focuses on the board's role in governing the organization.

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The size of the segments has no relation to importance.

The values encircle the practices of directors, boards their organizations and interactions with stakeholders.

Secondary sources include a series of Standards that focus on the governance of projects and ICT:

- (1) Directing Change: A guide to governance of project management (APM, 2011);
- (2) AS 8015-2005 Corporate governance of information and communication technology (AS8015, 2005); and
- (3) AS/NZS 8016: 2010 Corporate governance of projects involving information technology investments (AS8016, 2010)<sup>11</sup>.

<sup>&</sup>lt;sup>11</sup> Note: see also AS/NZS ISO/IEC 38500:2010 Corporate governance of information technology



Fig. 1. Petal diagram of governance.

Values – Yellow section	
Vision	<ul><li>GoPM: Assure the continued development of the organisation</li><li>AICD Value: Leadership</li></ul>
Values & Ethics	AICD 'Ethics' are a key sub-set of Values
Corporate Social Responsibility	AICD 4.4 Society and Community
Governing of the Board	AICD Segments 1 and 2
Principle Functions of Governance – 'the petals'	
Governing Relationships	AICD quadrant 4
Governing Change	<ul><li>AICD 3.3.1 Strategy</li><li>GoPM (full document)</li><li>AS8016 (full document)</li></ul>
Governing the Organisations' People	<ul><li>AICD 3.2.1 Executive Team</li><li>AICD 3.1.3 Culture</li><li>AICD 3.1.2 Policies and Assurance</li></ul>
Financial Governance	AICD 3.1.3 Corporate outcomes - financial
Governing Viability and Sustainability	<ul><li>AS8016 1.4.3 (e)</li><li>Cadbury and others</li></ul>

# **Appendix 2**

Standards focused on 'Enterprise Project Management':

- (1) Deutsches Institut für Normung (DIN) *Standard 69909 Multi-project management*: Management of project portfolios, programs and projects (DIN, 2013). This standard addresses the organizational and procedural framework for the management of several individual projects.
- (2) *Management of Portfolios* (Office of Government Commerce, 2007a) expands the concept of portfolio management from the basic selection and review process defined by PMI into the area of organizational change and some aspects of the 'management of project management'.
- (3) The Guide to the Project Management Body of Knowledge (PMBOK® Guide) of the Project Management Institute (PMI) refers to project governance as providing a comprehensive and consistent method of controlling the project to ensure its success (PMI, 2013). The PMBOK® Guide does not provide any additional information on how to ensure that project governance is aligned with corporate governance within the larger context of the organization.
- (4) The Association for Project Management published *Directing Change: A Guide to Governance of Project Management* (APM, 2011). The purpose of this guide is to influence directors and others to adopt excellent practices regarding the governance of programme and project management activities. This involves the alignment of the directors' interests with the programme and project teams and wider stakeholders.

## **Development of Paper:**

- (1) Original text developed 2012
- (2) Accepted for publication July 2013 (pre-press)
- (3) Published November 2014
- (4) Footnotes linking to White Papers and AICD diagram added post publication.

For additional project governance resources see: <u>https://mosaicprojects.com.au/PMKI-ORG.php</u>