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Status of IT Governance in South Africa: A comparative view

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ABSTRACT

IT governance has emerged as a fundamental business imperative because of its strategic role in realising business value. This comes from the fact that IT in many organisations has grown to become one of the most valuable assets and major driver of business success and revenue. As a result, executives in many organisations have come to realise that IT needs to be governed if business success and revenue are to be achieved.

This article seeks to compare the status of IT governance in South Africa as reported by the ITWeb in their IT governance survey with the global IT governance status report released by the IT governance Institute (ITGI). The intention is to show whether South Africa is in line with the rest of the world or if it is ahead or behind in terms of IT governance.

In order to compare the two surveys, results of the 2006 ITGI global report was collected including their very first results which came out in 2003. These were compared to check for progress. Similarly, ITWeb results of 2006 were collected together with the previous survey results of 2005 and compared against each other to see which practises had improved or weakened. Finally the ITGI global results were compared and contrasted to the ITWeb results to see if the local results were out of synchronisation or in line with the global results.

The results indicate that overall South Africa is in line with the rest of the world in terms of IT governance although there are some practices where catch up is necessary.



DECLARATION

I declare that this research report is my own unaided work. It is submitted in partial fulfilment of the requirements of the degree of Masters in Business Administration for the Gordon Institute of Business Science, University of Pretoria.

It has not been submitted before for any other degree or examination in any other University.

Geoffrey Chitambala

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CHAPTER 1. LITERATURE REVIEW

1.1. Corporate Governance

The word governance simply means the process of decision making and the process by which decisions are implemented or not implemented. Governance can be used in several contexts such as corporate governance, international governance, national governance and local governance. Since governance is the process of decision making and the process by which decisions are implemented, an analysis of governance focuses on the formal and informal factors involved in decision making and implementing the decisions made and the formal and informal structures that have been set in place to arrive at and implement the decision (UNESCAP, 2002).

In order to have an understanding of IT (Information Technology) governance and its role within an organisation, it is necessary to first have a brief overview of corporate governance and how IT governance fits into the bigger picture of corporate governance.

Corporate governance is the way of ensuring that there is adequate control over the use and disposition of organisational assets – both financial and non financial so that it can achieve its objectives. It includes complying with applicable laws and regulations, and also the values, ethics and culture that drive organisational policy and shape the way that it conducts its activities (CIMA, 2004).

For purposes of this brief overview, three definitions have been used to help to highlight the intent of corporate governance:

- Sir Adrian Cadbury says corporate governance is concerned with holding the balance between economic and social goals and between individual and communal goals. The governance framework is there to encourage the efficient use of resources and equally to require accountability for the stewardship of those resources. The aim is to align as nearly as possible the interests of individuals, corporations and society (Cadbury, 1992).



- The King II report (2002) defines governance as the means by which direction and control are applied to the stewardship of an organisation's assets, tangible and intangible, financial and non financial, in the pursuit and delivery of the primary objective of sustaining value creation.

Furthermore, that corporate governance is essentially a function of leadership and direction within the organisation; appropriate risk management and control over its activities and the manner in which meaningful disclosure relating to an organisation's activities are made to shareholders and other stakeholders.

- According to the (OECD) Organisation of Economic Cooperation and Development (2004), corporate governance establishes a set of relationships between an organisation's management, its board, its shareholders and other stakeholders. In addition corporate governance provides structure for determining organisational objectives and monitoring performance to ensure that objectives are achieved.

The above definitions of corporate governance all refer to the need to create structures or frameworks in which organisational resources could be used effectively and efficiently to ensure stakeholder value is realised. Cadbury in his definition refers to the ultimate aim of corporate governance; that of aligning the interests of individuals, corporations and society. The OECD and the King II definitions focus on the structures and processes that need to be in place to get as close to this alignment as is possible. They emphasise on the decision making mechanisms you create, whether committees and review boards or written policies, and the assignment of decision making authority and accountability.

All of this is done to ensure that individuals, corporations and society interests are aligned as nearly as possible to one another.

1.2. How IT Governance Fits into Corporate Governance

Business always has a challenge of deciding where to invest organisational resources to give the best return to their shareholders and stakeholders.



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This has not changed, and a common business language (Weill and Broadbent, 1998) must be found to facilitate the investment in IT and the return of value on that investment.

To achieve this, Broadbent (2003) adopted a model from (Weill and Woodham, 2002). This involves the IT Governance framework to have three major components. These components involve asking three questions:

1. What decisions need to be made?
2. Who has the decision and input rights?
3. How are the decisions formed and enacted?

Broadbent (2003) supports the framework by mapping the What of governance (enterprise goals, IT governance styles and performance measures) with the How of governance (desirable IT behaviour from enterprise goals, IT governance mechanisms in place and IT metrics and accountabilities) so that we can establish the trail of evidence (Weill and Broadbent, 1998) for IT governance transparency.

In their publication, Weill and Ross (2004) support this trail of evidence by developing a framework that links corporate governance with IT governance. The framework as illustrated in Figure 1 demonstrates the connection between corporate governance and Key asset governance, hence IT governance.

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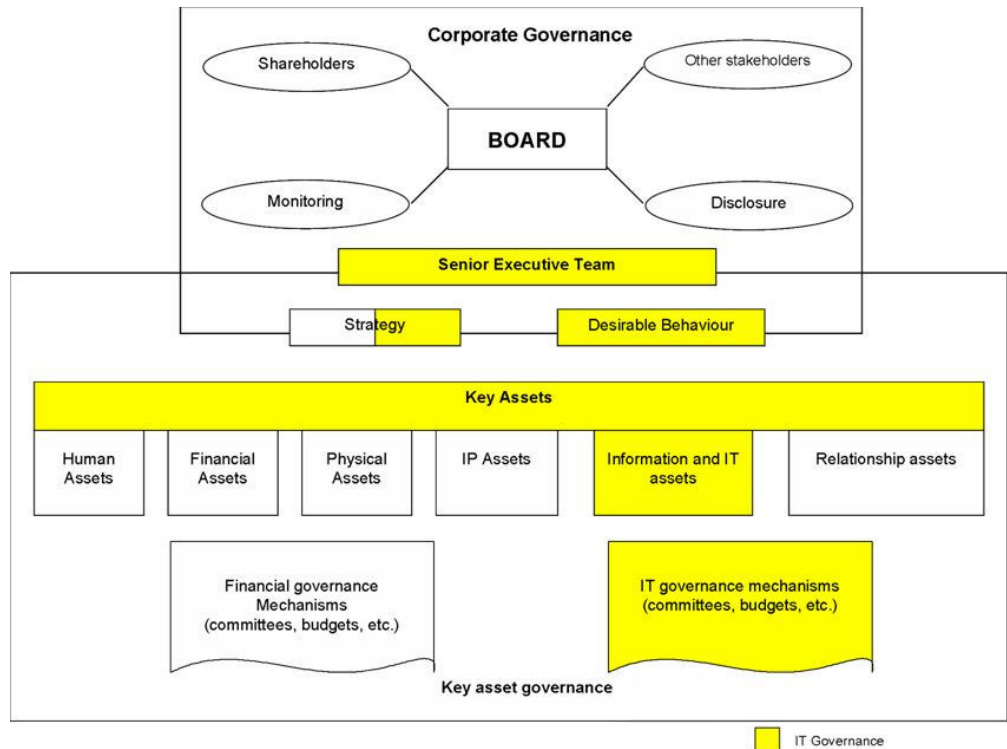


Figure 1: Framework linking corporate and Key Asset Governance (Weill and Ross, 2004)

Right at the top the board's relationship is depicted. The senior executive team is appointed by the board. Their responsibility is to formulate strategy and desirable behaviour for the organisation. Weill and Ross (2004) see a strategy as a set of choices.

Desirable behaviours include embracing the culture and beliefs of the organisation and are defined through strategies, value statements, mission statements, business principles, rituals and structures. In every organisation, desirable behaviours are different but should be clearly defined because they are the key to achieving effective governance (Weill and Ross, 2004).

We see from figure 1 that below the strategy and desirable behaviour are six key assets. These assets create business value for the organisation. Below are the assets and examples of each:



- Human Assets - People, skills, career path, training, mentoring
- Financial Assets - Cash, investments, liabilities, receivables
- Physical Assets - Buildings, Plant and Machinery
- IP Assets - Intellectual Property including product, service and process know how formally patented, copyrighted, or embedded in the organisation's people and systems
- Information and IT Assets - Digitised data, information, and knowledge about customers and information systems
- Relationship Assets - Relationships within the organisations as well as with customers, brand, reputation with customers, suppliers, regulators and channel partners.

These key assets need mechanisms to be governed and used. It is the senior executive team's task to ensure this happens. To have joint governance mechanisms to one's assets does not only increase the integration but also leads to a lesser amount of mechanisms which create more value (Weill and Ross, 2004). This demonstrates that IT governance is part of the overall enterprise governance.

According to Teoh (2006), good corporate governance is about accountability because it ensures that organisational goals are achieved. Similarly, good IT governance aligns the IT department with organisational goals and should help to deliver the intended results.

After this brief overview of corporate governance and how IT governance fits into the bigger governance picture, the stage is now set to look at IT governance.

1.3. What is IT Governance?

The field of IT governance has come to the forefront in just over a decade or so mainly to address organisational issues for IT delivery to the business. Since then, a lot of literature on the subject has emerged from different writers, many of them highlighting different perspectives in their definition of IT governance.



Most authors however, agree on IT governance as a top management concern of controlling the strategic impact of IT, and its value delivery to the business (ITGI, 2000).

Whether the core of IT governance is a set of structures, processes and relational mechanisms (De Haes and Van Grembergen, 2005), bundled performance metrics to aid IT process monitoring (ITGI, 2000) or cascaded Balanced Scorecard (BSC) (Van Grembergen, Saull, de Haes, 2004) is not agreed upon.

1.3.1. IT Governance Definition

As described above, there a number of definitions of IT governance. This research report will draw from the following definitions:

- The (MIT) Ministry of International Trade and Industry defined IT governance as the organisational capacity to control the formulation and implementation of IT strategy and guide to proper direction for the purpose of achieving competitive advantage for the corporation (MIT, 1999)
- Van Grembergen has defined IT governance as the organisational capacity exercised by the board, executive management and IT management to control the formulation and implementation of IT strategy and in this way ensure fusion of business and IT (Van Grembergen, 2002)
- The IT Governance Institute (ITGI) defines IT governance as the responsibility of the board of directors and executive management. It is an integral part of enterprise governance and consists of the leadership and organisational structures and processes that ensure that the organisation's IT sustains and extends the organisation's strategies and objectives (ITGI, 2004a)
- Weill and Ross defines IT governance as specifying the decision, rights and accountability framework to encourage desirable behaviour in the use of IT (Weill and Ross, 2004).



While Weill and Ross' definition focus on encouraging desirable behaviour in the use of IT, and therefore reduce risks, the other three definitions focus on aligning IT goals to business goals.

1.3.2. Drivers of IT Governance

There are a number of business drivers for IT governance. Some of these drivers emanate from legislation and regulations such as the Sarbanes-Oxley and King II report. Budgetary pressures to contain or minimise the cost of doing business is also another factor driving the need for IT governance. In many organisations IT is so critical to their business model that it is almost impossible to conduct business without IT; this strategic importance of IT to organisations is driving the need for IT governance as organisations realise that together with corporate governance, they can leverage technology, human and financial resources to increase competitive advantage for the organisations (Damianides, 2005).

Fundamentally however, IT governance is concerned about two things: IT's delivery of value to the business and mitigation of IT risks. The first is driven by the strategic alignment of IT to the business and the second is driven by embedding accountability in the enterprise (ITGI, 2003a). Value delivery is about executing the value proposition ensuring that IT delivers the promised benefits while Risk is the chance that any of the organisations' operations/assets can be affected negatively and therefore put the results of an organisations' operation at a disadvantage (ITGI, 2004b).

1.3.3. Objectives of IT Governance

The objectives of IT governance according to the IT Governance Institute is to make sure that IT within the organisation is aligned with the rest of the organisation's objectives and that responsible use of IT resources should support the organisation to maximise business goals and exploit new opportunities while minimising the risks.

The IT Governance Institute has identified five main objectives of IT governance. These are ensuring that:

- There is alignment between IT and the business
- IT resources are used responsibly
- IT related risks are managed appropriately
- IT is delivering value by enabling the enterprise to exploit opportunities and maximise benefits, and
- IT performance is managed according to business needs (ITGI, 2003a).

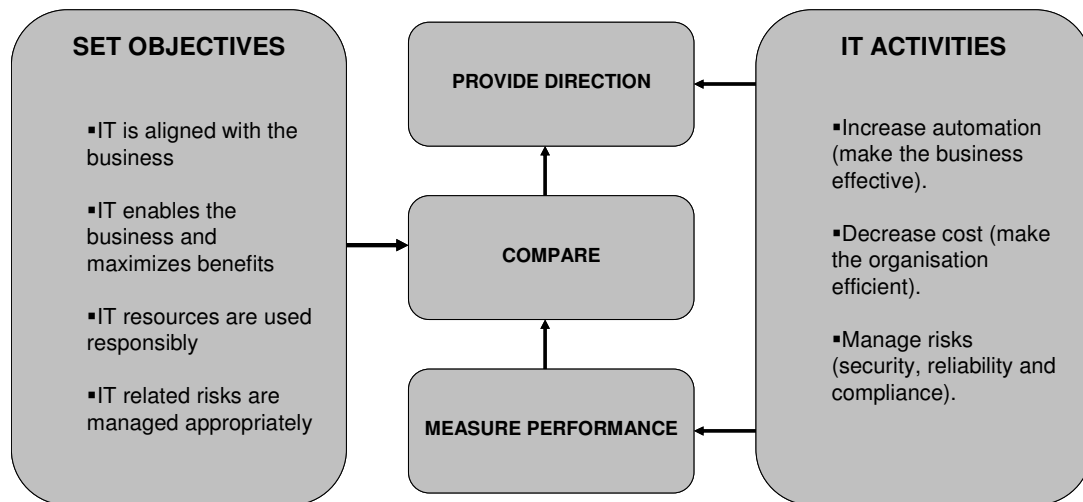


Figure 2: IT Governance Framework according to the IT Governance Institute (2003. p.12)

1.3.4. Why is IT Governance Important?

In today's organisation the IT baseline costs are significant and rising (Marshall and McKay, 2004). It has been reported that they make up about 75 percent of the operating budget and represent approximately four percent of gross revenue (Gartner Group, 2003). This report further argues that IT underpins an organisation's operation to such an extent that an IT related



failure or breach can precipitate a significant financial loss or the development of serious legal risks and issues for an organisation.

Recent examples of corporate failure, both locally and abroad, have brought into sharp focus the importance of adherence to standards of good corporate governance. But corporate governance cannot be achieved if a large portion of costs and risks are excluded (McDowall, 2003). The Australian National Audit Office (McDowall, 2003) considers IT governance as a critical component of corporate governance.

It lists the following reasons to support the statement:

- The enabling of new service delivery models and business practices by IT
- The matching of the increased value of information with the increased IT costs
- The risks of providing services in a digital world with its dependence upon third party suppliers and service providers, and
- The impact of IT on business continuity due to increasing reliance on information and IT.

This indicates that the management of risk is the cornerstone of IT governance, ensuring that the strategic objectives of business are not jeopardised by IT failures. In South Africa, like elsewhere in the world, organisations that pay attention to the management of their IT risks could be halfway down the road of creating shareholder value. However, understanding the risks relating to the use of IT is still a challenge for business executives who probably do not have an in depth appreciation of the technical issues.

Good IT governance ensures that IT investments are optimised and are aligned with business strategy, and deliver value within acceptable risk boundaries — taking into account culture, organisational structure, maturity, and strategy (Duffy, 2002). With IT at the core of most of today's businesses and with the current focus on compliance and risk management as a result of



legislation like Sarbanes-Oxley, organisations can no longer afford to have poor IT governance. Effective IT governance requires having the appropriate organisational structures and empowering them to make the required decisions (Duffy, 2002).

According to the IT governance Institute, the ultimate reason IT governance is important is that expectations and reality does not match. Boards usually expect management to:

- Deliver IT solutions of the right quality, on time and on budget
- Harness and exploit IT to return business value
- Leverage IT to increase efficiency and productivity while managing IT risks (ITGI, 2003a).

Furthermore, the IT Governance Institute reports that ineffective IT governance is likely to be the root cause of negative experiences many boards have had with IT such as:

- Business losses, damaged reputations or weakened competitive positions
- Deadlines not met, costs higher than expected and quality lower than anticipated
- Enterprise efficiency and core processes negatively impacted by poor quality IT deliverables
- Failure of IT initiatives to bring innovation or deliver the promised benefits (ITGI, 2003a).

The IT governance observation that expectations and reality are not matched is very much what happens in the South African environment. Most executives expect more from IT, however, they are not sure how best to manage IT like other departments because most of them do not understand IT, and this is the reason why they should be begging for IT governance.

1.4. The IT Governance Framework

IT governance practices need to focus on ensuring that stakeholder expectations of IT are met and that IT risks are mitigated. In order for organisations to ensure these stakeholder expectations are met, they need to put in place frameworks that ensure that there is a roadmap of what they intend to do and checking that what they have done reflects what they intended. This will ensure that there is feedback on the initial plans so that a comparison of what was intended is matched with what has been achieved. There are a number of frameworks that organisations use, but the focus here will be on the frameworks that help promote IT governance. **Figure 3** below depicts some of the control frameworks that are available:

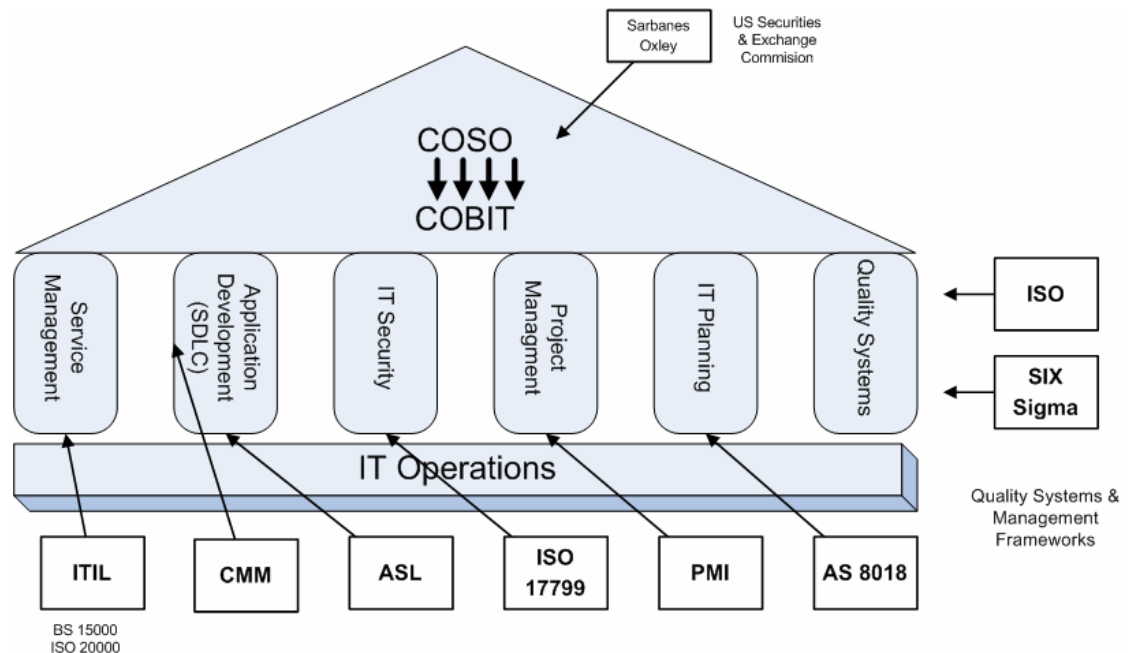


Figure 3: Control Frameworks (Source - Pink Elephant 2004)

Organisations wanting to implement internal control can use any of the above frameworks that are applicable in their environment.

Compliance to internal procedures and external legislations has also increased the need for organisations to work which a framework that is recognised by all market participants. One of the legislations that have had an impact on IT governance is the Sarbanes-Oxley act (Damianides, 2005).



Sarbanes-Oxley Act of 2002 was in response to a number of scandals in American businesses and is a critical piece of legislation that affects how public organisations deal with corporate governance, financial disclosures and the practice of public accounting.

It focuses on enhancing corporate governance through measures that will augment internal checks and balances and ultimately strengthen corporate accountability (Damianides, 2005).

The main aim of the act with relevance to IT security resides in Section 404 which centres on the internal controls of an organisation.

Its aim is to ensure and mandate tighter control of accounting practices, particularly auditing and is ultimately about ensuring that internal controls are in place to secure financial information (Busby, 2005). Although Sarbanes-Oxley is intended to address financial reporting, in practice, its most significant impact is felt in IT and this makes IT governance critical to help ensure safe and secure financial information. This is why it is important to check the status of IT governance in South Africa to ensure that its financial reporting standards do not lag behind those of their trading partners.

Section 404 includes three categories:

- Organisation – level controls which include policies, corporate governance and information sharing
- Applications controls for both financial/ERP and specialised applications
- IT general controls, governing programme development, programme changes, computer operations and access to programme ad data (Handler, 2006).

Sarbanes-Oxley requires organisations to adopt and declare the framework used to define and assess their internal controls. Two frameworks have emerged as foundational to the compliance efforts and have been adopted by a majority of organisations worldwide.



These are:

- (COSO) Committee of Sponsoring Organisations of the Treadway Commission, primarily for financial processes, is an integrated framework providing specific guidance on implementing and maintaining internal controls.

COSO identifies five components of internal controls needed to meet financial disclosure obligations – control environment, risk assessment, control activities information and communication and monitoring

- CoBiT (Control Objectives for Information Technology). This is an IT framework that maps COSO (Handler, 2006).

In addition IT process frameworks such as ITIL (IT infrastructure Library) and CMMi (Capability Maturity Model integrated) assist in achieving compliance by facilitating the adoption of mature, effective processes on which to impose the control framework (Handler, 2006).

One important point to note here is that COSO and CoBiT are control frameworks while ITIL and CMMi are IT best practices. Should organisations processes and IT processes not be repeatable and enforced, it could prove difficult to apply effective controls later on audit. This is why organisations, especially South African organisations, need to ensure that processes are automated through IT and hence the need for IT governance frameworks.

1.5. The South African IT community

South Africa's IT sector has been growing rapidly and is considered one of the top ten emerging markets for computer companies. When considering the banking sector, for instance, the four largest South African banks are placed among the world's 500 largest banks (Hodge and Miller, 1997). All the major financial institutions operate nationally and have extensive networks of regional offices and associated electronic networks. Most of the world's IT players have a presence in South Africa, and the country is playing an increasingly important role in the global IT industry.

While Hodge and Miller (1997) wrote their paper almost a decade ago, their analysis has been supported by Gartner research Vice President Raskino (2006)



when he mentioned that South African IT budgets are expected to grow faster than their international counterparts this year. Globally, IT budgets are expected to grow at 2.7 percent this year. South African companies, however, will experience growth at a faster rate than this, as Gartner has pegged SA's IT budget growth at 7.2 percent (Raskino, 2006).

Raskino (2006) further says compared with a spread of industries, SA's expected IT spend still outflanks global industry specific growth. Even the sector categorised as high technology, expected to grow at 6.7 percent this year, will grow its IT budget by only 2.5 percent.

Industry specific trends and challenges are becoming more prevalent in the South African IT economy and growing. In line with what Raskino said, Hamilton (2005) an analyst from BMI-T had in fact found that in South Africa, the IT market grew 4.4 percent from R43.9 billion in 2004 to reach R45.8 billion in 2005. The IT services market grew 4.8 percent, the packaged software market grew by 3.7 percent and the total hardware market grew by 8.5 percent in 2005. The IT market is expected to grow at a CAGR of 5.8 percent to reach R60.8 billion in 2010.

The top three markets accounting for the largest growth are Finance, Government and Distribution (Van Heerden 2003). These industries are driven by different factors such as risk management in Finance, the need to deliver services to citizens and for government to be seen as citizen centric, in government and solutions that are moving to the point of sale in distribution. The finance industry accounts for the largest portion of IT spend in South Africa.

Other industries investing heavily in IT include the manufacturing, communication and media; transport and transport services; resources and construction.

Most of these industries are under pressure to offer real time solutions and integrate with any other customer's systems (Van Heerden 2003).

With such huge amounts of money going into IT, South African executives, like their counterparts all over the world are demanding to see value for money from these investments, better alignment between IT and business and improved quality of service delivery from IT. Hence South Africa's organisation need to be in as much a



hurry as the rest of the world in ensuring that their organisations have good IT governance.

From the foregoing it's evident that organisations in South Africa are investing a lot of money in IT. The key question for these organisations is whether the investments in IT are in harmony with strategic objectives and whether these investments build the capabilities necessary to deliver business value. IT governance specifies the decision making authority and accountability to encourage desirable behaviour in the use of IT (Gartner, 2003). That is why IT governance is important to South African organisations because it provides a framework in which the decision made about IT can be aligned with business strategy and culture of the organisation (Freedman, 2005).

1.6. Relevance to South Africa

Earlier a definition by Cadbury (1992) of corporate governance was given as holding the balance between economic and social goals and between individuals and communal goals. This implies that there could be tremendous benefits for any country that practises good corporate governance. The presence of an effective governance system within individual organisations and across the economy as a whole helps to provide a degree of confidence that is necessary for proper functioning of a market economy.

In July 2003, the World Bank working jointly with (IMF) International Monetary Fund produced a country assessment of corporate governance on South Africa. This assessment benchmarks the country's observance of corporate governance against the OECD principles of corporate governance (Fremond and Capaul, 2003). A report such as this one allows South Africa to distinguish itself in the competition for equity capital both at home and abroad. Investors are always looking for places where they can invest their money. But investors are more willing to invest in countries where they are assured of transparency, integrity and accountability (Fremond and Capaul, 2003). Such flows of investments could impact positively on the macroeconomic variables of the country such as the exchange rate, interest rate and employment. This would ultimately be a valuable input in sustaining the overall economic growth of South Africa and maintaining financial stability.



But South Africa cannot benefit from all this unless the country and individual organisations establish procedures and frameworks in which vital decision could be made in a consistent manner. That is why IT governance is critical not only to ensure that the risks are reduced for individual organisations but also bring value to the stakeholders. Stakeholders include shareholders, employees, suppliers, customers and the community in which an organisation does business. If an organisation delivers value to stakeholders, it means the quality of life for that community is uplifted and South Africa as a whole benefits in terms of reduced crime, poverty and disease.

IT governance is also beneficial to the South African economy in terms of its ability to help organisations in the country to comply with the different legislations and regulations cheaply than otherwise would have been. This makes it easier for audits to be conducted and contributes to building reputation of conducting business in the South African economy. This again would allow South Africa to reap the full benefits of global capital markets by attracting foreign investments.

1.7. Literature Review Conclusion

Clearly the literature of IT governance is still in its infancy as seen from the many definitions from writers about the subject. Most of the definitions highlighted in this report about IT governance focus on the processes of decision making rather than the content.

Nonetheless, it is clear that IT governance is part of enterprise governance and enterprise governance is concerned with setting directions, establishing standards and principles, and prioritising investments. What warrants IT governance focus is the pervasiveness of IT which has meant that most organisations' business execution depend on it. If business execution depends on IT, it means profit realisation and shareholder value can not be realised if IT is not properly governed.

Essentially therefore, IT governance has come about to mitigate risks associated with IT so that executive management can have an oversight of what is happening in IT and also ensure that IT investments deliver value to business. An organisation needs the right processes and systems in place in order for it to compete in the



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market place. It would be very difficult to assess the value, cost, risk and performance of IT services without these systems and processes in place.

Organisations that are looking to govern IT and maximise the business value derived from IT need to take a comprehensive view that considers the entire scope of IT processes, as well as all IT investments and resources.

IT governance also provides a framework through which an organisation can make consistent decisions about IT and without such a framework, it becomes difficult even to allocate and prioritise what IT should deliver and how it should deliver the service to the business.

This is the major reason why CIOs and business leaders are embracing good IT governance so that they can manage the priorities, processes, and people needed to run IT in much the same fashion as a business entity.

For all the reasons above, IT merits attention from top executives in the organisations starting from the board.



CHAPTER 2. ARTICLE ON THE STATUS OF IT GOVERNANCE IN SOUTH AFRICA: A COMPARATIVE VIEW

2.1. Introduction

Organisations are owned by the providers of capital, the shareholders and these shareholders through the boards delegate decision making power to managers. The managers in turn run the day to day affairs of an organisation in the interest of shareholders. But because of agency problems - alignment between management's incentives with shareholder interests - this does not always happen. Hence boards are appointed to ensure that they protect the interests of shareholders by monitoring management's performance and to deal with potential conflict of interest. They also need to find effective approaches for encouraging and rewarding the right behaviours.

Therefore, broad concerns for shareholders' interests and sound management have led to the emergence of corporate governance regulations and standards for overall enterprise governance. Enterprise governance is the set of responsibilities and practices exercised by the board and executive management with the goal of providing strategic direction, ensuring that objectives are achieved, ascertaining that risks are managed appropriately and verifying that the enterprise's resources are used responsibly. The "Board" is understood to denote the entity that is ultimately accountable to the stakeholders of the enterprise (Guldentops, 2001).

The essence of corporate governance therefore is to address the agency problem arising from the split between management and shareholders and to mitigate potential conflicts of interest and problems of asymmetrical information (King, 2006). In his opening speech to the 2006 IT governance conference in Johannesburg, Judge King spoke about the danger of this asymmetrical information to non executive directors and gave an example of a corporate failure in a South African based company – LeisureNET - where non executive directors were fed with misinformation. Shareholders' concerns therefore, have led to the emergence of governance principles and regulations to determine how organisations will be governed and to create frameworks which can be used to monitor risk. The focus of these governance principles and regulations has been mainly on financial risk and



protection of shareholder value. However, the impact of realising such principles and regulations is felt in IT. Hence, boards and executive management need to extend governance, already exercised over the organisation, to IT by way of an effective IT governance framework that addresses strategic alignment, performance measurement, risk management, value delivery and resource management (ITGI, 2004a). This is what has necessitated the special attention on IT governance. Weill and Ross (2004) define IT governance as specifying the decision rights and accountability framework to encourage desirable behaviour in the use of IT.

IT is essential to manage the transactions, information and knowledge necessary to initiate and sustain economic and social activities. In most organisations IT has become an integral part of the business and is fundamental to support, sustain and grow the business. Successful organisations understand and manage the risks and constraints of IT. As a consequence boards of directors understand the strategic importance of IT and have put IT governance firmly on the agenda (ITGI, 2003b).

A number of institutions therefore, now conduct the status of IT governance in specified regions and the most prominent is the ITGI which conducted the 2nd of its IT governance Global status survey. Although this report is a global survey, none of the countries in Africa were included in the sample and this article will benchmark the South African ITWeb national status survey against the ITGI Global status survey. The intention is to compare and contrast the status of IT governance in South Africa with The Global Status report.

2.2. Research Methodology

The ITGI conducted 695 interviews with CIOs and CEOs around the world in 22 countries. The interviews were conducted by telephone or mail depending on the participant's location and the interviewee's native language. The survey was conducted under the market research society and marketing research association code of conduct to guarantee anonymity of the participants. The intention of the survey was to reach members of C-suite to determine their sense of priority and actions already taken relative to IT governance and their need for tools and services to help assure effective governance.



The ITWeb on the other hand had an online survey to their readership. The ITWeb is the premier online IT publication in South Africa. It is the most trusted voice in local technology publishing and the first port of call for an audience that ranges from technology professionals to CEOs. In this survey a total 90 respondents responded to the survey. Screening of respondents was done for significant involvement in information technology. The purpose of the survey was to track the current state of IT governance in South Africa.

The research conducted in this paper has, inter alia, the following limitations:

- The sample population for the ITWeb was not clearly defined as in the ITGI which defined its Sample as CEOs and CIOs and this makes it difficult to draw general conclusions on C-suite members from the South African survey
- While full accessibility was granted to the raw data of the ITWeb survey, there was no access to the raw data of the ITGI global status survey.
- The comparison periods are not the same. While the first survey by ITGI was done in 2003 and was followed by the recent 2006 survey, the ITWeb had their first survey in 2005 and a follow up one in 2006.

2.3. ITGI Survey Results

In 2003, the IT governance Institute undertook its first survey to see the extent to which IT governance is recognised and established. The survey also strived to find out what frameworks were being used by organisations to ensure good IT governance. This was followed by another survey whose results came out in 2006.

Both surveys of the ITGI assessed the priorities and actions of senior managers in organisations on IT governance. A total of 695 CEO/CIOs were interviewed in 22 countries around the world. In the 2006 survey, 38 percent of these respondents were from Asia-Pacific region.

2.3.1. Importance and Benefits of IT

In the 2006 results, 87 percent rated IT as quite important to very important to the execution of business strategy. 10 percent were not sure whether IT contributed to the business strategy or not and a further 3 percent rated IT as



not very important to the execution of their business strategy. None of the respondents rated IT as not important at all to their business strategy execution.

In the 2003 results survey, 91 percent of the respondents indicated that IT was quite important to very important to their execution of business strategy, 7 percent were not sure and one percent each indicated that IT was not very important and not important at all to their business strategy execution.

2.3.2. Frequency of IT on the Board Agenda

In the latest survey results of 2006, out of a sample of 695, 63 percent of the respondents indicated that IT appeared regularly to always on the board agenda. 33 percent of these respondents said IT appeared only sometimes on the board agenda while 3 percent said IT never appears on the board agenda.

In the previous survey however, 58 percent of respondents said IT appeared on the board agenda regularly to always. 37 percent voted for sometimes when they see IT on the board agenda and 5 percent said IT never appears on the board Agenda.

2.3.3. IT governance Implementation Status

In 2006 results, 36 percent of the 623 respondents were in the process of implementing or had already implemented IT governance. 22 percent were considering implementing IT governance, while 36 percent were not considering implementing IT governance at all.

The results of 2003 showed that 40 percent had either implemented or were in the process of implementing IT governance. A much larger number of 42 percent were not even considering implementing IT governance according to this survey and only 18 percent were considering implementing IT governance.

2.3.4. Value from IT

A good figure of 74 percent of respondents indicated that they are getting quite a lot of value from IT while 17 percent were not sure if they were getting



any value from IT and 9 percent said not very much value was realised from IT and a further 3 percent indicated that they did not get any value from IT. This question was not asked in the previous survey of 2003 and therefore there are no results for comparison.

2.3.5. Maturity level of IT governance

The 2006 survey results indicated that 18 percent of respondents rated their organisations as having level 4 to level 5 maturities while 20 percent indicated that their organisations had a maturity of level 3. A slightly higher number of 21 percent said their organisation showed level 2 maturity and an even higher number of 26 percent of respondents believed that their organisations were at level 1. At least 11 percent of the respondents said their organisations were still at level 0 in terms of maturity.

2.3.6. Implementation of partial IT governance measures

In the 2006 survey, 70 percent of respondents said they had implemented, were in the process of implementing or considering implementing IT alignment to the business. In terms of value delivery, 69 percent of respondents had either implemented, in the process of implementing or considering implementing this measure of IT governance. Resource management had 75 percent and risk management had 73 percent of respondents reporting having implemented, in the process of implementing or considering implementing. Performance management scored 67 percent of the respondents indicating that they had either implemented, in the process of implementing or considering implementing this phase of IT governance.

The 2003 survey saw 49 percent of respondents indicating that they had implemented, in the process of implementing or considering implementing IT to business alignment. On value delivery, only 39 percent of respondents had implemented, in the process of implementing or considering implementing this phase of IT governance. Resource and Risk management had 50 percent and 34 percent respectively of respondents who said that they have implemented, in the process of implementing or considering



implementing. Like Risk management, Performance management had 34 percent of those surveyed indicating that they had implemented, in the process of implementing or considering implementing.

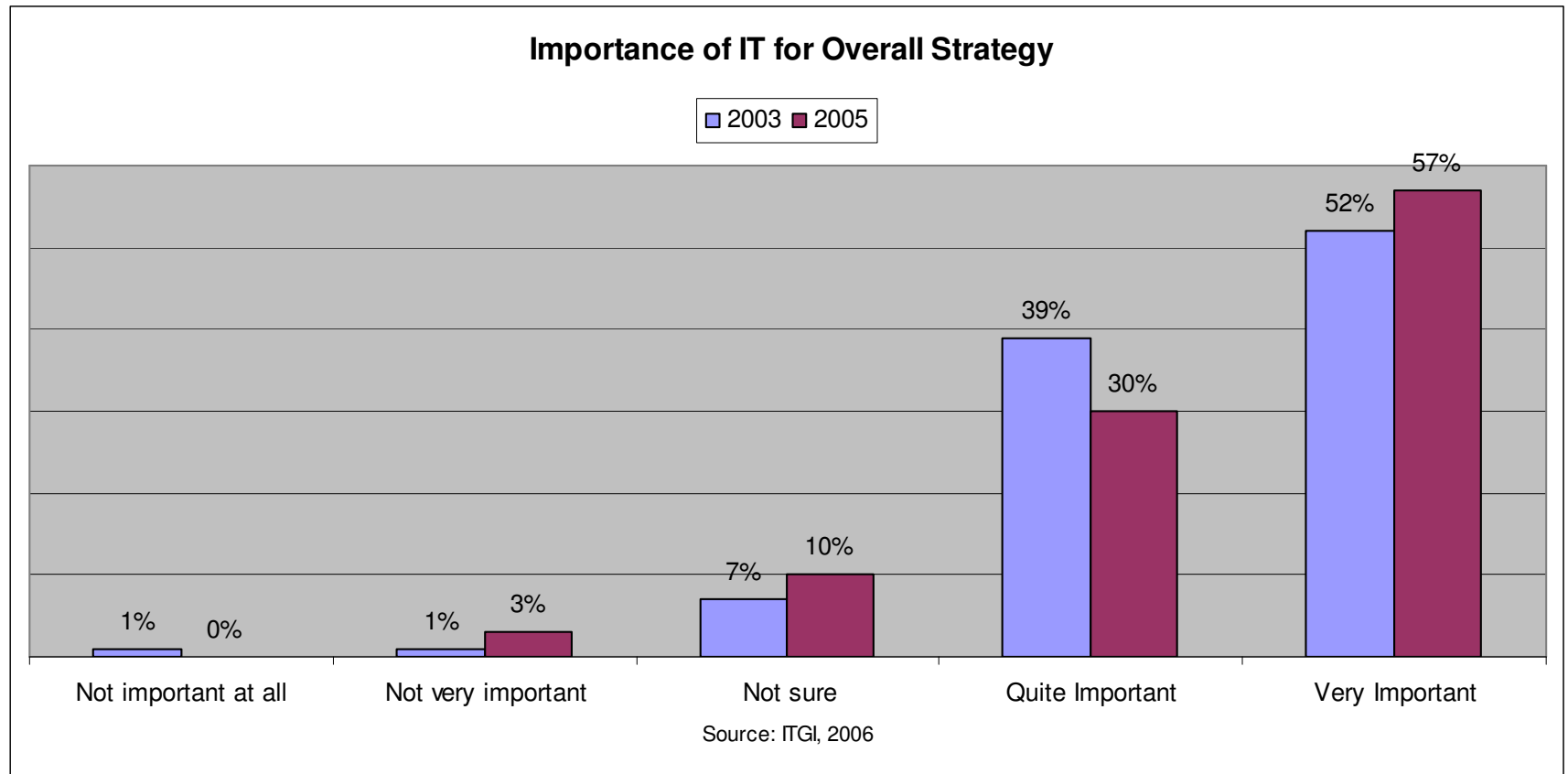
2.3.7. Responsibility for IT governance

In the 2006 results, 33 percent of the respondents indicated that the CIO had overall responsibility for IT governance and that CEOs were responsible in 24 percent of those organisations who had participated in the survey. CFOs were reported to have been responsible in 10 percent of the organisations that participated while in 2 percent of the organisations that responded, compliance and audit had the responsibility of IT governance. In 6 percent of those organisations that responded, no one had responsibility for IT governance while in 24 percent of these organisations, IT governance responsibility was given to other portfolios in the company.

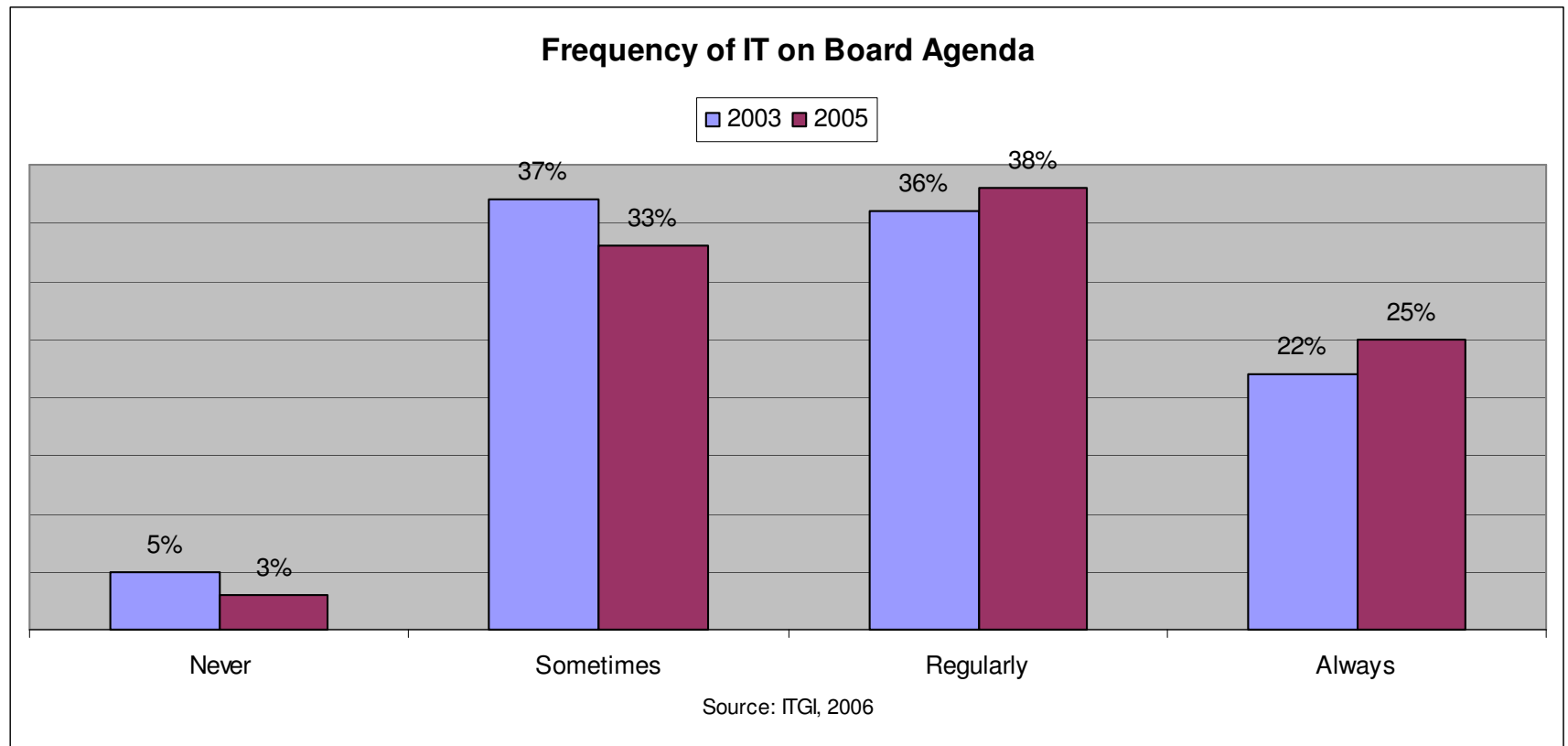
2.3.8. Communication from IT to Business

The 2006 survey results showed that 14 percent of participants rated communication from IT to business as always happening but 41 percent of the participants said communication happened regularly. In 38 percent cases communication only happened sometimes while 7 percent of those interviewed said that communication between IT and the business never happens.

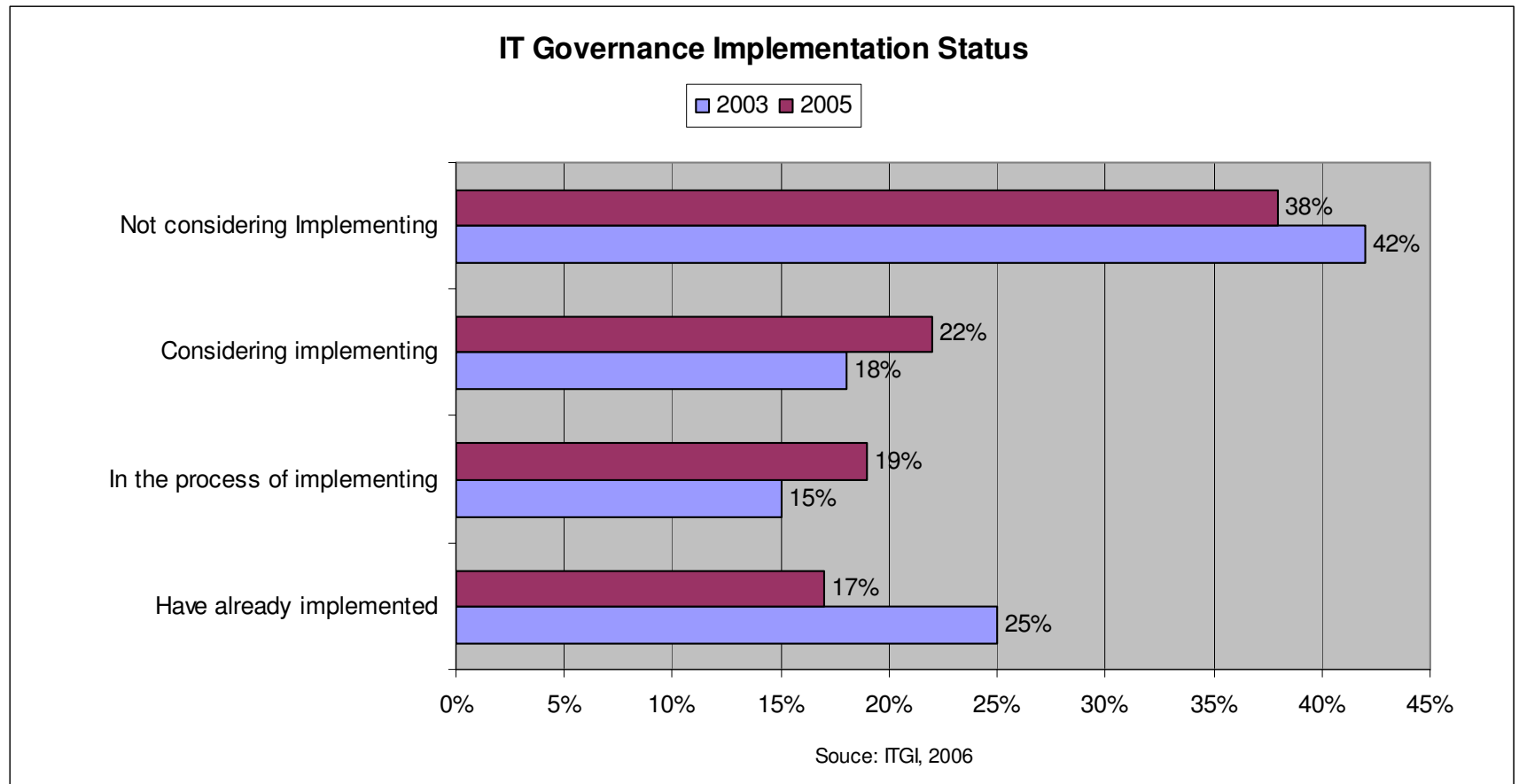
The following graphs (1-13) are partial extracts from the ITGI 2006 survey and the ITWeb 2006 survey.



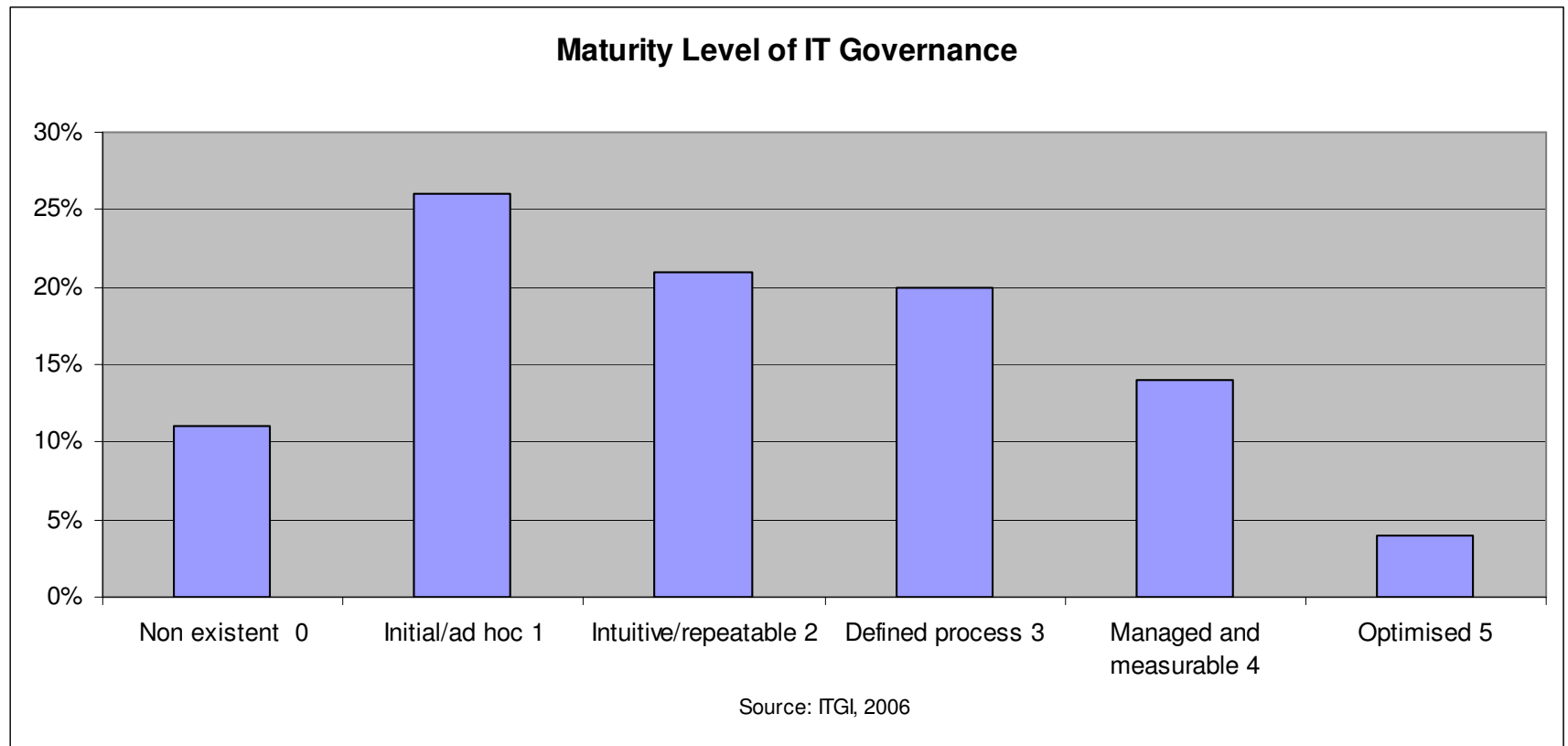
Graph 1: Importance of IT



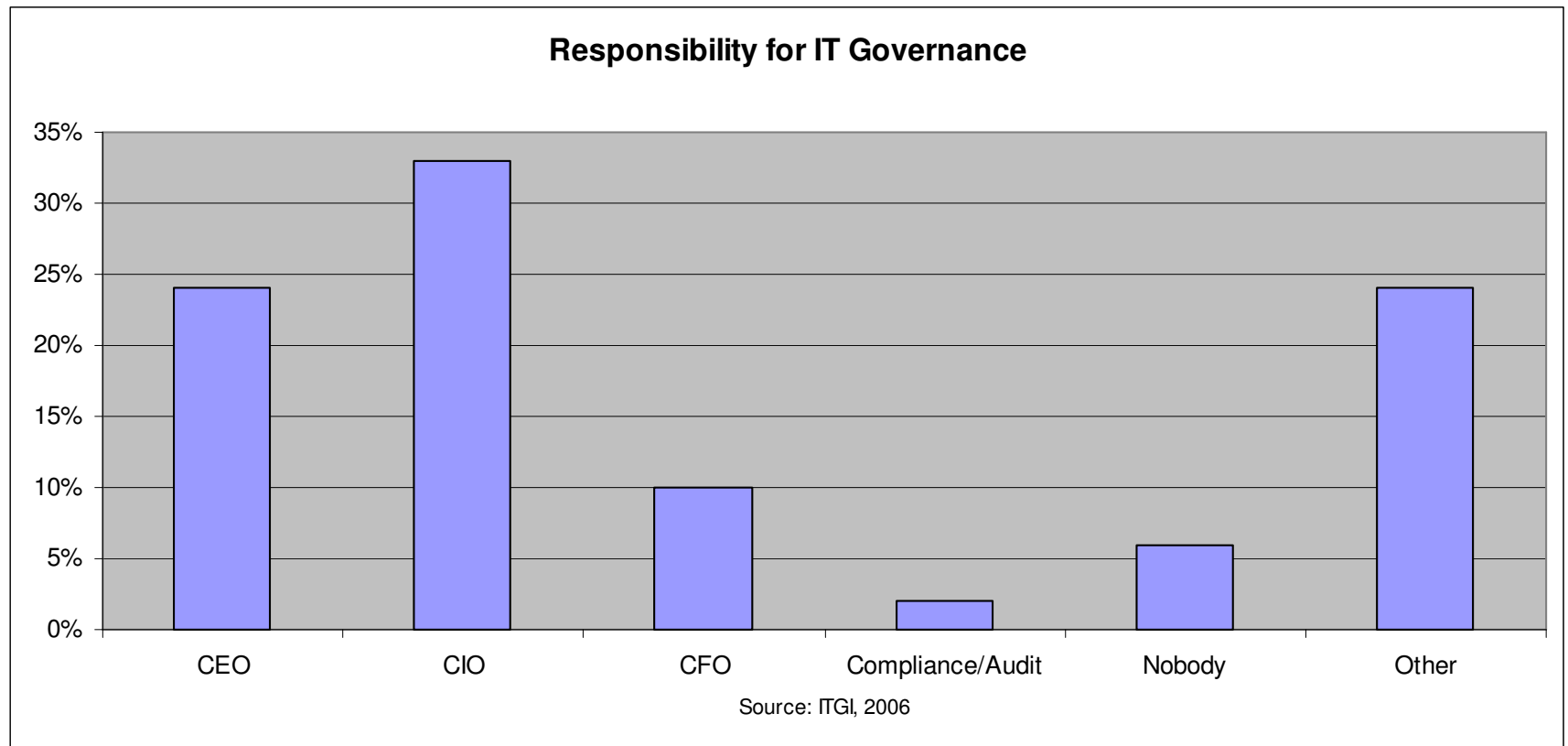
Graph 2: Frequency of IT in the Board Agenda



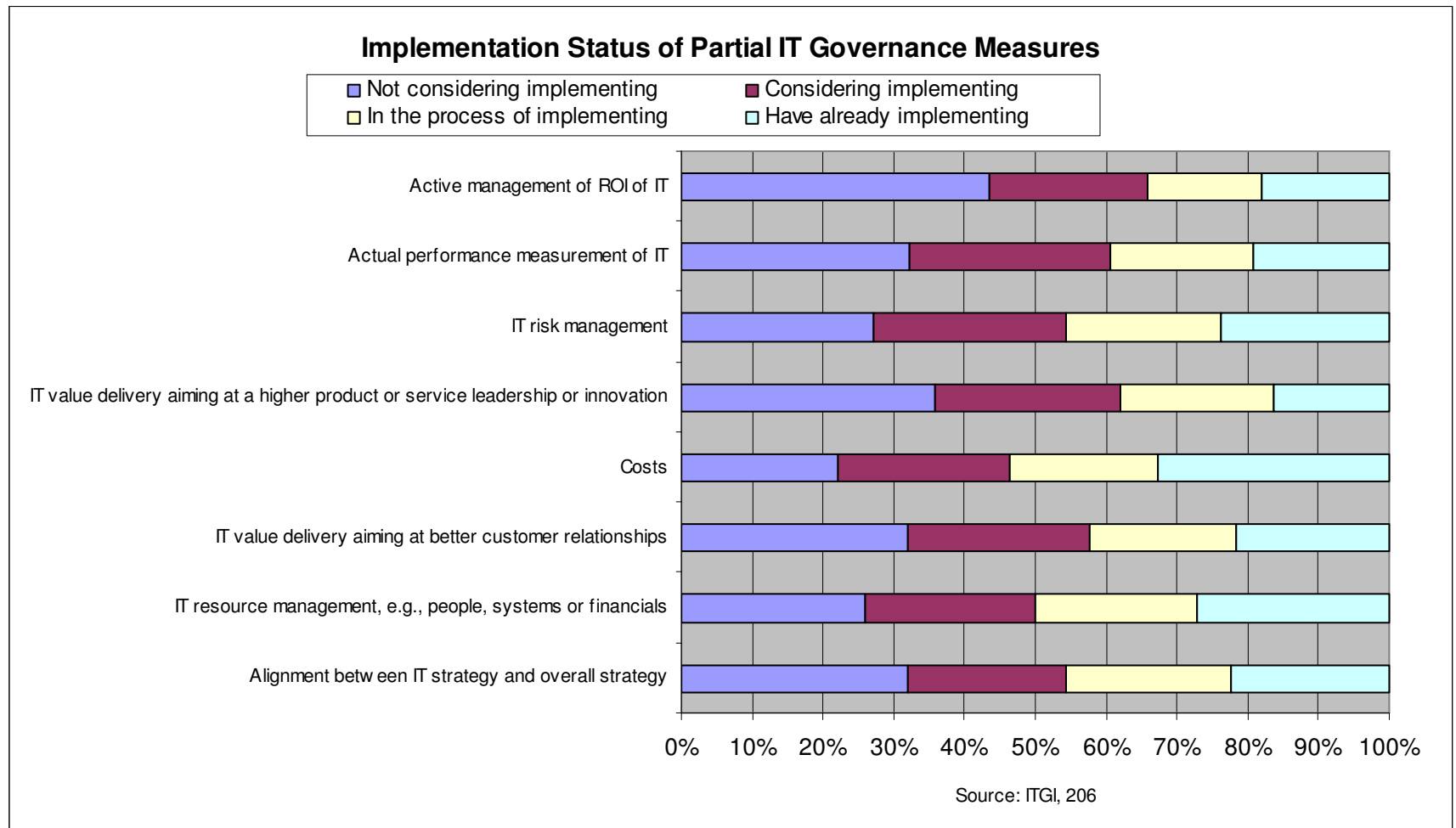
Graph 3: IT Governance Implementation Status



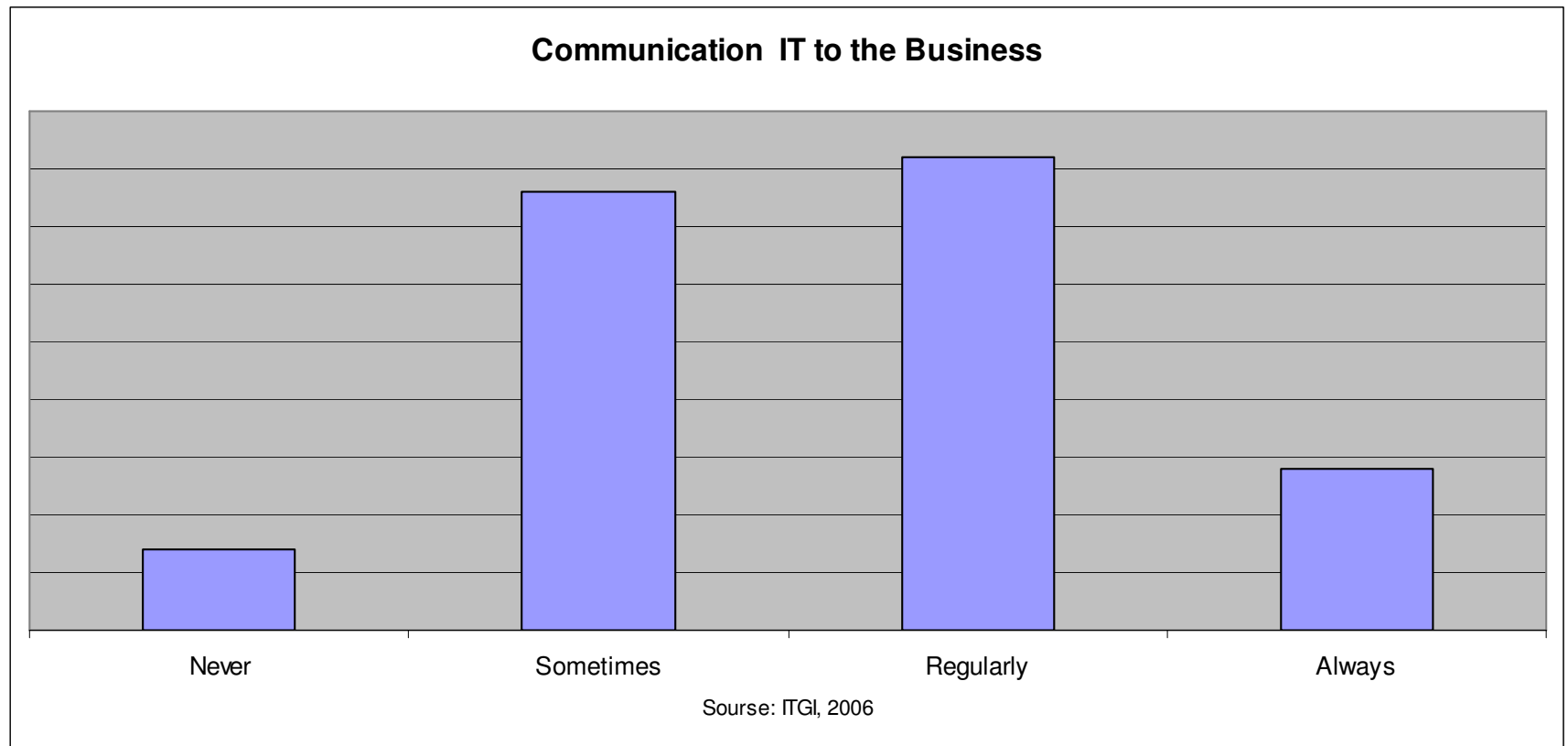
Graph 4: Maturity Level of IT Governance



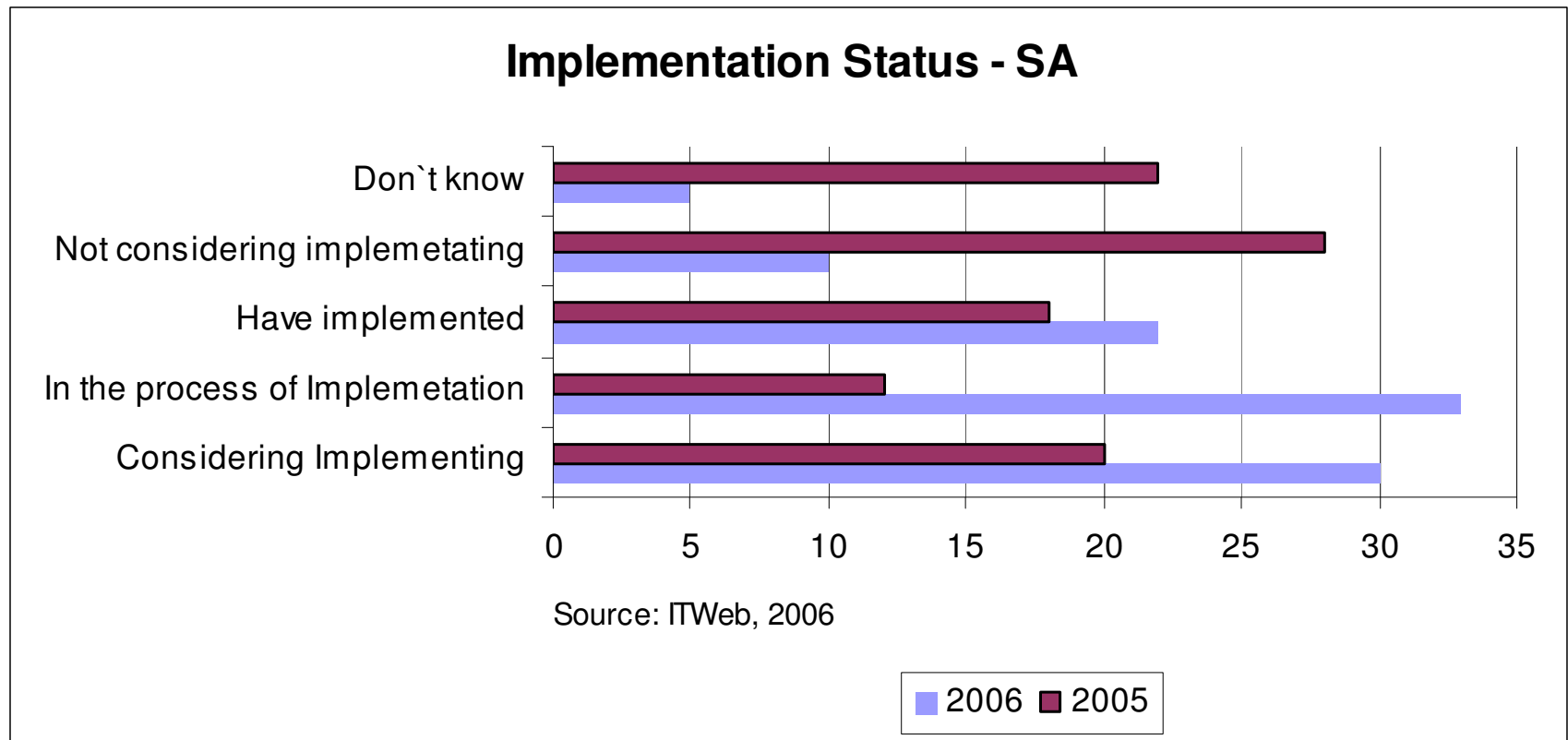
Graph 5: Responsibility for IT Governance



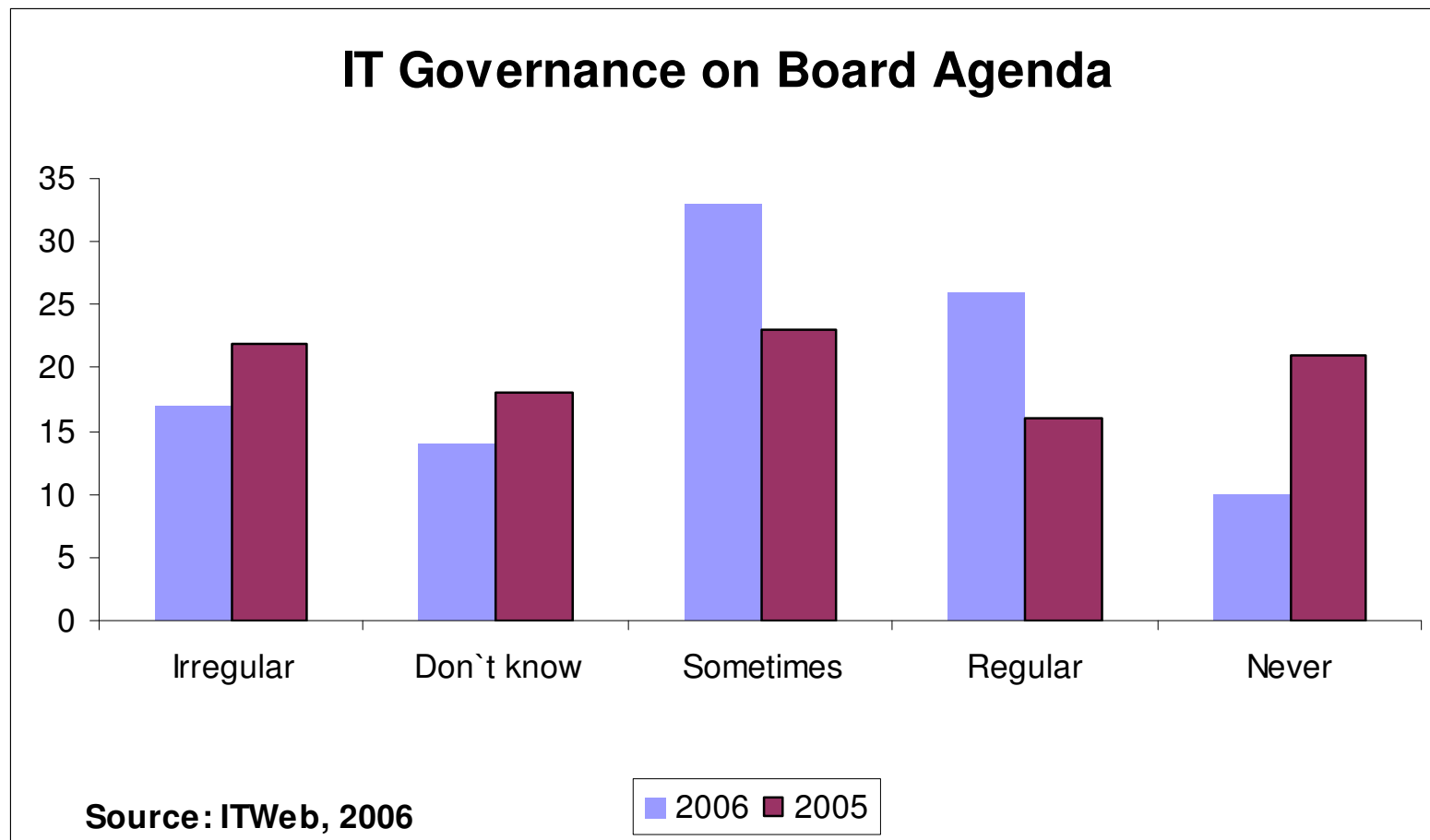
Graph 6: Partial IT Governance Measures



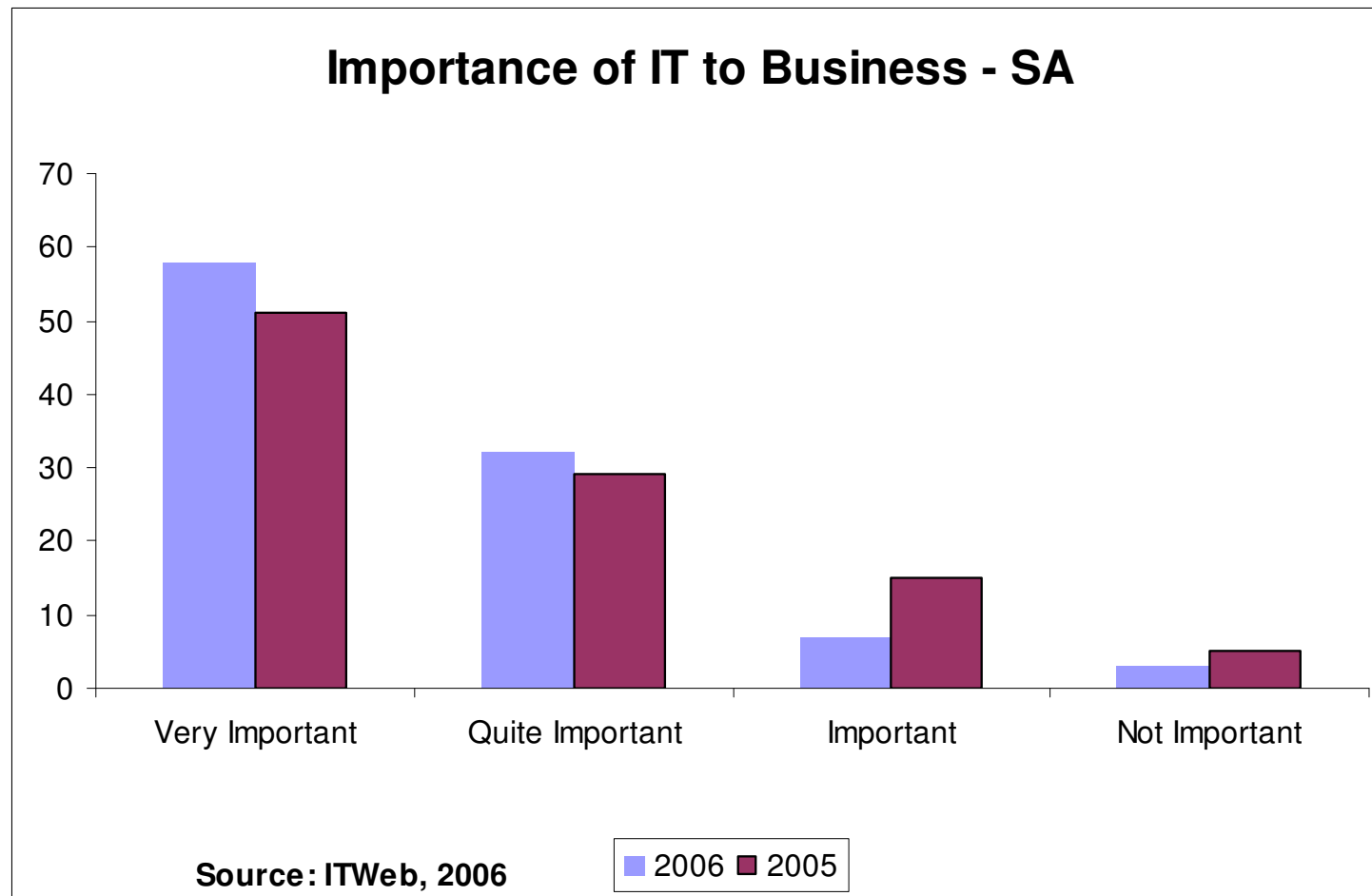
Graph 7: Communication IT to the Business



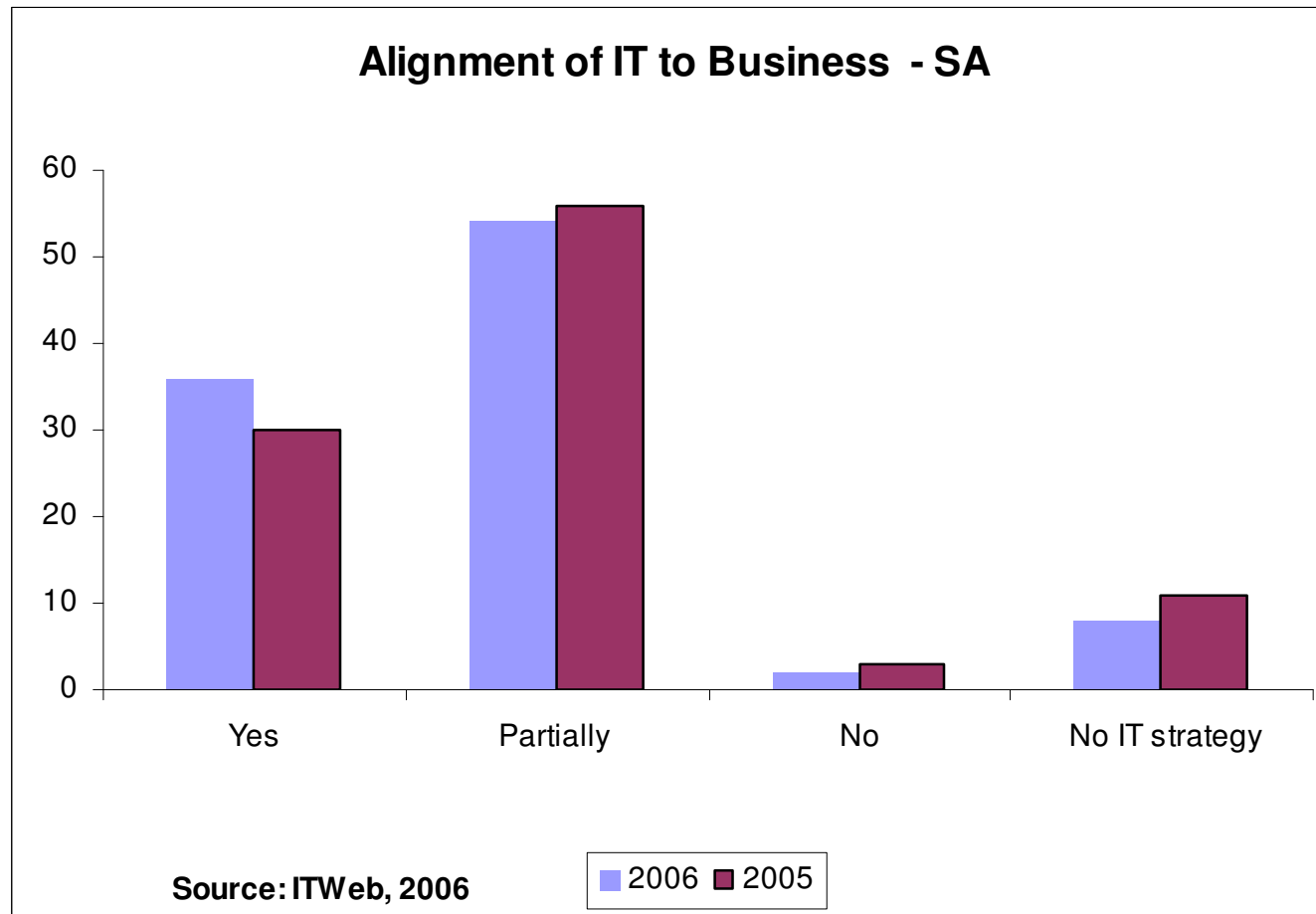
Graph 8: Implementation Status – SA



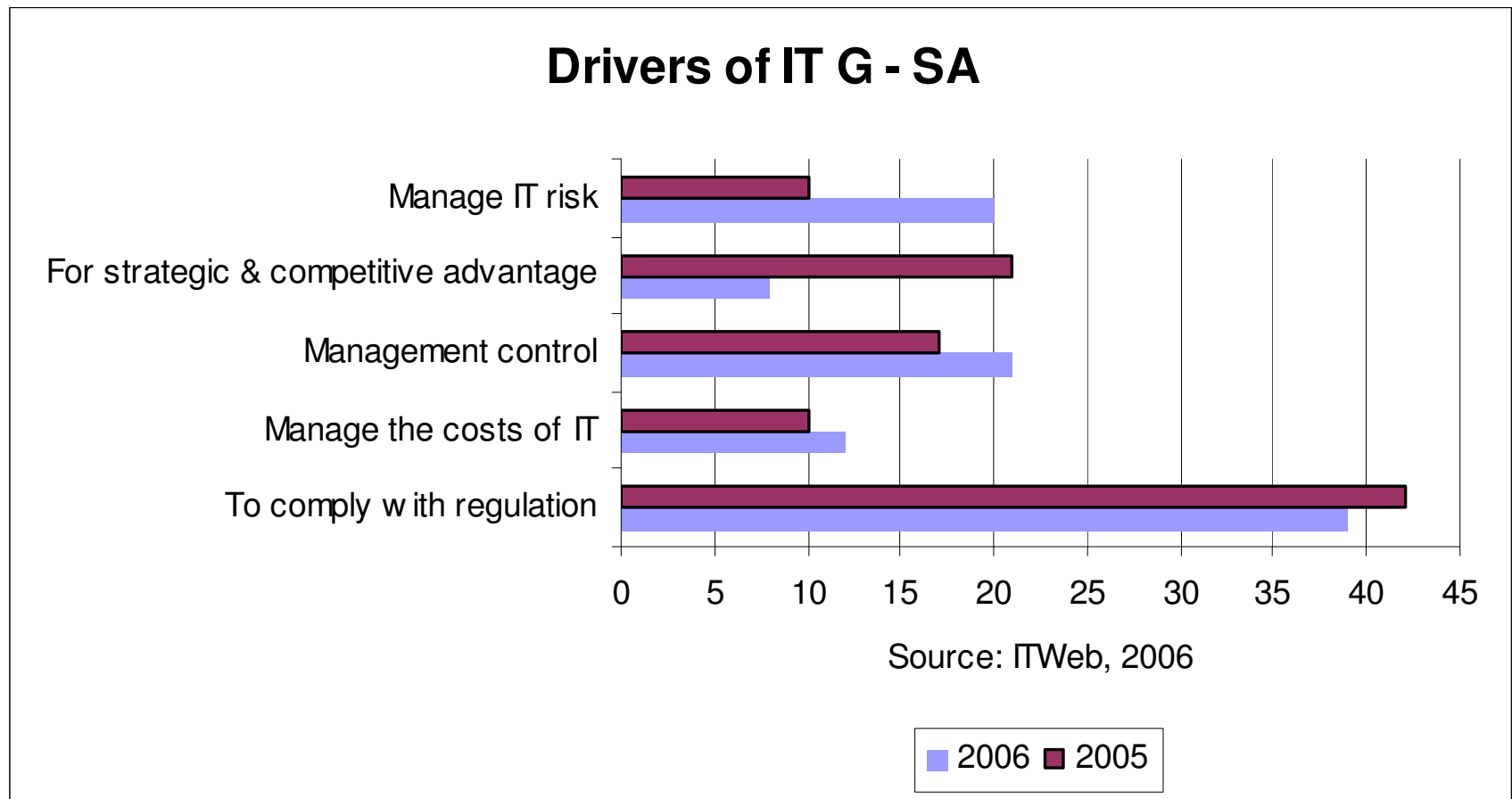
Graph 9: IT Governance on the Board Agenda – SA



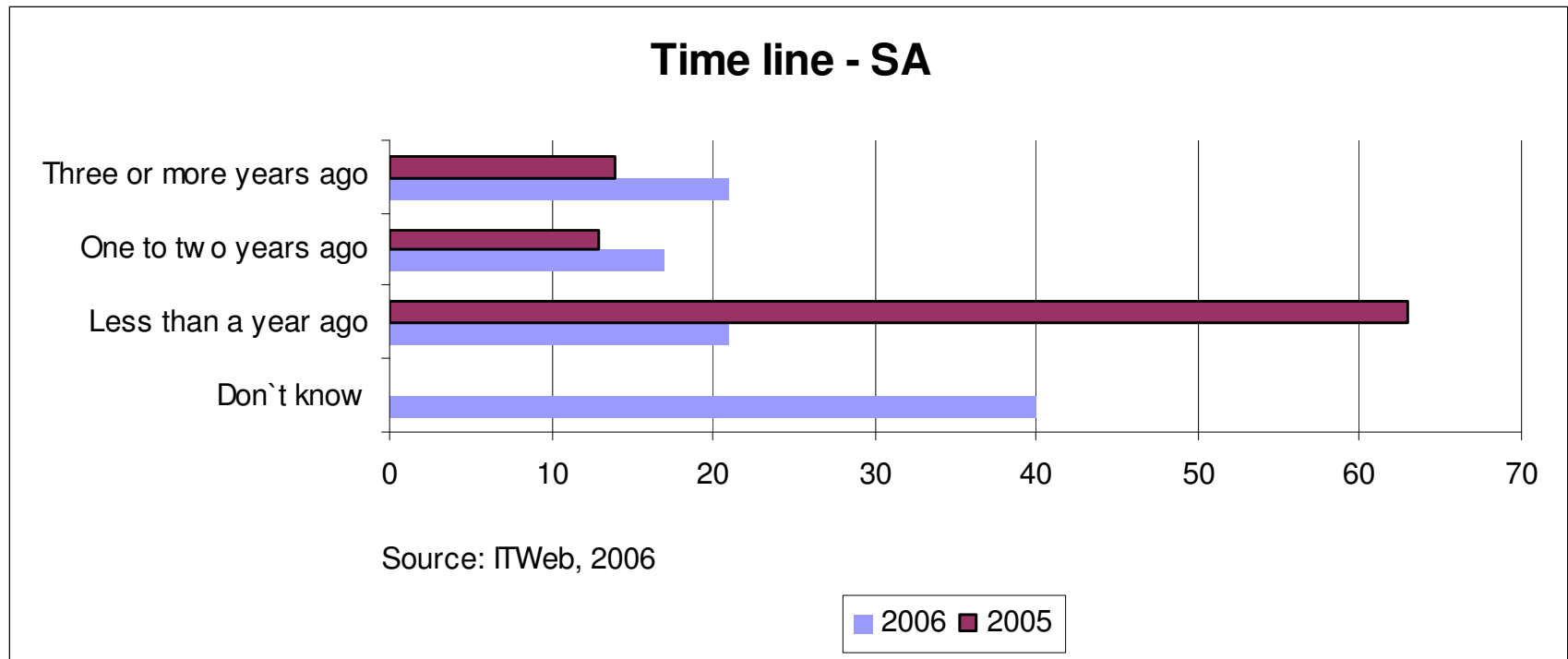
Graph 10: Importance of IT to Business – SA



Graph 11: Alignment of IT to Business Strategy – SA



Graph 12: Drivers of IT Governance – SA



Graph 13: Time line - SA



2.4. Interpretation and Analysis

Importance of IT

Most organisations are facing tremendous pressure to increase efficiency and minimise costs in delivering their products/services to their customers. This means information on which decisions are based in the organisations should be timely and accurate – and more than ever IT plays a major role in ensuring that this happens (Oltsik, 2003). While the percentage of respondents who rated IT as quite important to very important dropped by 4 percent in the latest global survey, those who rated IT as very important to their business strategy increased by 5 percent. In general, however, the results of 2006, reaffirms the importance of IT to business strategy execution. This is no coincidence because globalisation has placed IT at the centre of economic growth for most organisations and countries and its importance to business will surely continue as transactions between and among nations increase.

Furthermore organisations with rapid changes in customer needs or preferences are looking to IT to provide innovative, quality new products or services that they can deliver to market timeously (OECD, 2004).

IT on Board Agenda

The 2006 results also show some encouraging results with regard to IT being found on the board agenda. The latest results show a 5 percent increase from the previous results. At almost two thirds of respondents indicating that their organisations have IT on their board agenda, it means that management is slowly beginning to recognise that IT needs the same amount of scrutiny as other departments in the organisation and ensuring that risks associated with IT are properly understood by executives and that return on IT investments is properly measured.

While the results show an increase, there is still a long way to go before IT can have a firm place on the board agenda. According to ITGI (2003), despite the extensive investments and risks inherent in IT, IT governance has not received the board attention it merits because IT requires more technical insight; it is complex and IT knowledge at board level is limited. However, executive management need



to understand that effective IT governance is the watchdog of business today that would give them visibility over IT. Unless they have input into the IT strategy that should help business strategy deliver on customer promises, executive management are likely to approve IT investments that fail to deliver value to business.

A Compuware (2005) report states that recent examples of weak IT governance and board level guidance cost Disney \$878 million which the company had to write off because of poor investment decision in an internet division. It also lists Kmart as having lost \$130 million for supply chain hardware and software that did not work and another company, Gateway, which disposed off \$143 million worth of IT investments that were not aligned to business strategy. These figures only go to emphasise that if the boards in these organisations had visibility over IT, they could have asked the necessary questions before these investments were undertaken. This insight into the operations of IT could have also helped them to understand how IT enables business and at the same time understand how it creates risks for the business.

Implementation

The 2006 report also revealed that implementation of IT governance has dropped down by 4 percent from the previous survey. However, the number of those who said that they were not even considering implementing IT governance came down by 8 percent.

It means a lot more organisations are considering implementing IT governance in their environments than in the previous years. The fact that those who were in the process, or had implemented IT governance dropped by 4 percent from 2003 results, is however a concern.

While the number of organisations who regard IT as important to the execution of their strategy is high, those who have actually implemented IT governance to ensure IT help deliver this strategy and mitigate IT related risks is much lower.

Guldentops (2001) takes a broader view by stating that the networked economy has brought more efficient markets, enabled streamlining of processes and optimised



supply chains. It also has created new technology and business risks and new information and resilience requirements. These new requirements and risks imply that management of IT needs to be more effective and transparent. It also implies that IT must get onto the governance agenda. This entails that organisations should move faster in their implementation of IT governance if they want IT to contribute effectively to the delivery of value to the business.

Perhaps CIOs need to step up and do more in terms of educating executives, in a language they understand, the role and the real impact of IT on an organisation for executives to start paying a lot more attention to IT governance.

Maturity Models

The essence of capability maturity models is to improve processes in organisations so that they are able to produce better products and services for their customers. Capability levels apply to an organisation's process improvement for each of the processes and the overall maturity of an organisation is defined as maturity level. In 2006 survey results, at least 63 percent of respondents indicated that their organisations had a maturity level of 2 and above.

This means that in almost two thirds of those organisations who participated, they had repeatable processes working. The concept of maturity normally referred to as CMM (Capability Maturity Model) allows management to determine the capacity of an entity to manage operational risks and outcomes for a particular process (ITGI, 2006). It is encouraging to see that over 60 percent of respondents are managing these processes. It is difficult to say at which level an organisation should strive for. Most prefer first to understand what the business wants to achieve and then build a maturity to support those business goals. This in fact means if you have a process that is able to support your business model it may not be a good idea to keep improving the process. Unless such an improvement will contribute to the organisation's performance it may not be a good investment to keep improving your processes.



IT to Business Alignment

An organisation's investment in IT needs to be in harmony with business strategic objectives in order to build the capabilities necessary to deliver on those objectives. If these are misaligned, the efficiency and effectiveness of IT is likely to go down and when this happens, the business will ultimately fail to deliver on its promises. The latest results show a 21 percent increase over the 2003 results from respondents reporting that alignment of IT to business is a huge focus in their organisations. What is interesting to read in this report is that resource management also jumped up by 25 percent from the previous results indicating that organisations have acquired resources to build capability to ensure this alignment. The latest results also show an almost 40 percent increase in organisations reporting focus on risk management. What is interesting though is that while there is this increased focus on risk management, both the ITGI results and the ITWeb results, as we shall see later, show lower figures of those who have actually implemented IT governance in their organisations.

In fact most partial measures of IT governance saw an increased focus by those organisations who participated. This perhaps explains why there was an increase of 30 percent in organisations that indicated that there are getting value from IT.

Responsibility for IT governance

Responsibility for IT governance lies with the board and senior executives. Unfortunately, the latest report showed that CEOs are responsible for IT governance in only 24 percent of those organisations surveyed. As in the previous survey, CEOs are still not comfortable talking about IT governance. The main purpose of IT governance is to ensure value delivery and mitigation of IT risks and one would imagine that this is what would interest CEOs because CEOs are responsible for oversight of all organisational assets including IT. Yet this is not so. In fact one would expect the CEO and the boards to start begging for IT governance in their organisations because good IT governance can reduce risks, minimise costs and maximise the value derived from IT investments. Instead the results show that in 33 percent of those organisations surveyed, CIOs were responsible for IT.



This means most decisions concerning IT are left to CIOs. Those CEOs who are leaving IT decisions to the CIOs and IT managers are essentially losing visibility to a huge amount of an organisation's assets.

Communication between IT and Business

Communication between IT and business is important; first for the IT department to understand that when all their applications are running at 100 percent it does not imply that their customers are happy. An application can run at 100 percent from an IT perspective and still fail to satisfy the customer if the IT department does not understand what the business is trying to achieve. While 41 percent of respondents said that IT communicated sometimes to business, only 14 percent of respondents said in their organisations IT communicated to business regularly. This figure is a bit low if IT wants to contribute positively towards the achievement of business goals.

Secondly, Weill and Ross (2004) pointed out that many senior managers are willing to be involved in IT governance but are not sure where to contribute. It would be helpful for the CIO and his/her staff to communicate to business so that they are able to interpret business problems into technical solutions.

Further, communication can also build awareness of IT governance in senior business managers, and this would make the selling of IT governance to the board and executive management a lot easier.

2.5. ITWeb Survey Results

The ITWeb surveys are local (South Africa) and aim to track the current state of IT Governance in South Africa, by reviewing actions taken by local organisations relative to IT Governance. A total of 90 responses were received from the ITWeb readership coming from different sectors and sizes of organisations in their 2006. This was a web based survey which lasted for four weeks much like their 2005 survey.

2.5.1. Importance and Benefits of IT

The 2006 survey found that 90 percent of respondents regarded IT to be either quite important to very important to the execution of business



strategy. Seven percent rated IT as important to their business strategy execution and 3 percent said that IT was not important at all to the execution of their business strategy.

In the 2005 survey, 80 percent of the participants rated IT as very important to the execution of their business strategy.

Those who rated IT as important to their business strategy execution totalled 15 percent while respondents who indicated that IT was not important at all to their business stood at 5 percent.

2.5.2. Implementation of IT governance

In the 2006 survey, a total of 55 percent of respondents indicated that they had either implemented or in the process of implementing IT governance. Just below a third (30) percent of all the respondents indicated that they were considering implementing IT governance while 10 percent were not even considering implementing IT governance. Five percent did not know whether their organisations have implemented, in the process or considering implementing IT governance.

The earlier survey of 2005 found that 30 percent of respondents had either implemented or were in the process of implementing IT governance. This same survey found that 28 percent of respondents were not considering implementing IT governance and that 20 percent were considering implementing.

2.5.3. Frequency of IT Governance on board

In the latest survey, 59 percent of respondents indicated that IT governance appeared regularly to sometimes on the board agenda. A further 17 percent of respondents said that IT governance appeared irregularly on board agenda while 10 percent said that IT governance never makes it on their organisations' board agenda. At least 14 percent did not know whether IT governance ever makes it onto the board agenda.

The 2006 results show an upside over the 2005 results which saw 39 percent of those who participated in the survey indicating that IT



governance regularly or sometimes appeared on the board agenda. 22 percent of respondents believed that IT appeared on board agenda irregularly while an almost same number (21 percent) said that IT never appears on the board agenda. Another 18 percent of participants indicated that they did not know if IT governance appeared on the board agenda.

2.5.4. Alignment of IT to business strategy

In 2006 results, an overwhelming 90 percent of respondents indicated that IT is partially or wholly aligned with business strategy. A marginal 2 percent of participants said that IT was not aligned to their business strategy while a further 8 percent reported that there was no IT strategy in their organisation.

In the earlier results of 2005, 86 percent of respondents indicated that IT was either partially or wholly aligned to business strategy. While 3 percent of respondents indicated that there was no alignment between IT and business strategy, 11 percent of respondents in this survey reported that they did not have IT strategy in their organisation.

2.5.5. Implementation Timeline

In the 2006 survey, 21 percent of respondents said that they implemented IT governance in less than a year, 17 percent between one and two years and a further 21 percent said they had implemented IT governance in three or more years. However, 40 percent of these respondents reported that they did not know when IT governance was implemented in their organisation. This answer was an addition to the options in 2005.

In the 2005 results, a large portion of respondents totalling 63 percent indicated that they only implemented IT governance in less than a year, 13 percent of those said IT governance was implemented in one or two years while 14 percent reported having implemented IT governance in three or more years.



2.5.6. Drivers of IT governance

Out of 90 respondents who participated in the 2006 survey, 39 percent indicated that they were implementing IT governance mainly to comply with regulation, 20 percent cited that it was because of managing IT risks, 12 percent said managing IT costs was a big driver, a further 21 percent cited control as a driver and those who said strategic and competitive advantage was a driver of their IT governance implementation stood at 8 percent.

In the 2005 results, compliance with regulation was reported as a huge driver with 42 percent of respondents having indicated so in the survey. Those who said managing IT risks stood at 10 percent and another 10 percent was reported for those who believed managing IT costs was a driver. Control and strategic reasons for implementing IT governance stood at 17 and 21 percent respectively.

2.5.7. Responsibility of IT governance

In the 2006 survey, 41 percent of respondents indicated that CIOs were responsible for IT governance and only 18 percent said CEOs were responsible for IT governance in their organisations. Other portfolios had 27 percent and CFOs were responsible for IT governance in 10 percent of the organisations surveyed. No one was responsible for IT governance in 4 percent of organisations that participated.

2.5.8. Frameworks in Use

With regard to maturity, 57 percent of respondents indicated that they had implemented ISO 17799. A further 18 percent were considering implementing ISO 17799 while 25 percent said they were not even considering implementing this standard. On CoBiT, 43 percent reported having implemented this framework, 29 percent were in the process and 28 percent said that they were not considering implementing this standard. The other popular framework in South Africa, ITIL, had 42 percent of respondents reporting that they have implemented it, 35 percent were considering while 23 percent said they were not considering implementing this framework.



2.5.9. Maturity

The 2006 report revealed that 85 percent of all those who participated had a maturity level of between level one and level 2, with 48 percent sitting on level 2. 8 percent had level 3 and only a percent for level 4. None of the respondents had level 5 maturities.

2.6. Interpretation and Analysis

Importance of IT

In the latest survey, South African organisations reported a 10 percent increase over the 2005 results of organisations who rated IT as important. More than half reported that IT was very important to their business and almost a third said that IT was quite important to the execution of their business strategy. Organisations in South Africa are aware that business goals cannot be achieved without the continuous support of IT and indeed for many they cannot even function. Judging from the level of technology in South Africa organisations, this is in line with expectations.

Organisations also realise that it would be an enormous task, with huge cost implications, to comply with different rules and regulations without IT. South African organisations mostly follow the King II report guidelines. Unlike the Sarbanes-Oxley, the King reports (King I and King II) has adopted a comply or explain stance. Apart from the King reports, organisations also have to comply with industry specific regulations.

The constant changing of these rules and regulations almost makes it difficult to ensure that an organisation is in compliant with regulations without automated IT systems. Some South Africa organisations have to comply with regulations in different markets in which they operate. Without IT these could just be overwhelming for an organisation's operation. It is therefore not surprising that in the 2006 survey results, only 3 percent of respondents rated IT as not important to their business strategy execution.



Implementation

Although 90 percent of respondents rated IT as important to their execution of business strategy in the 2006 survey, only 55 percent of these had either implemented or were in the process of implementing IT governance in their organisations. However, this is 25 percent more from the previous survey of 2005. Of particular interest is the number of respondents in 2005 who indicated that they did not know if their organisation had implemented or were in the process of implementing IT governance. Just below a quarter percent responded that they did not know. In the 2006 survey, this figure came down to 5 percent.

This could mean that more and more organisations are becoming aware of IT governance and that IT executives are communicating the IT governance practices a lot more than they did in the previous years. Noteworthy was also the fact that those who were considering and in the process of implementing IT governance increased by 10 percent and 21 percent respectively from the 2005 results.

Recognition

While more than 90 percent of executives in South Africa recognise that IT is vital to the success of their organisations, many still are not affording IT proper representation at boards. Boards exercising proper IT governance often uncover and address problems in advance; simply by asking the right questions (Damianides, 2005). Despite the many experts highlighting the benefits of IT alignment and risk mitigation, IT has not always achieved the board level or executive management level attention it deserves (Damianides, 2005). The ITWeb readership community feels that IT governance appeared on board 20 percent more in 2006 than in 2005. This is encouraging because the board is the custodian of all of the organisation's assets including IT. Losing oversight on some of the organisation's assets means an oversight on some of the risks that the organisation is carrying. There is a substantial body of literature reporting that the key issue of IT governance is the management of IT related risks. Another significant observation is that the figure of those who reported that IT never appears on the board agenda in 2005 came down by half in 2006. This shows that



more and more organisations are beginning to understand that to get value from IT, the executive management and the board needs to closely scrutinise IT investments.

Alignment of IT to Business

A well aligned IT business strategy can help an organisation create and exploit new markets, link customers to an organisation and even define new standards of excellence. Even more IT could continuously innovate strategically relevant new processes that help business deliver better products and services to customers.

While there was no significant increase between the 2005 and 2006 survey results from respondents indicating a good fit between IT and business, both figures of 86 percent and 90 percent respectively do show encouraging signs for South African firms. A much lower figure of 2 percent reported that there was no alignment between IT and business strategy in the latest survey results.

Drivers of IT governance

In 2006, the top drivers of IT governance in South Africa were compliance to regulation, management control and managing IT risks. Compliance and management control were still in the top three in 2005 except risk management which took the place of strategic and competitive advantage as a reason for implementing IT governance. This is an interesting outcome. Looking at the percentage by which strategic and competitive advantage has reduced from 21 percent to 8 percent; one is bound to conclude that there is some confusion among ITWeb readers about the real drivers of IT governance implementation in their organisations.

Responsibility of IT governance

In the latest of report 2006, it is evident that IT governance is in the hands of CIOs in South Africa with 41 percent of respondents saying that CIOs are responsible for IT. Only 18 percent of participants said in their organisation the CEO is responsible for IT governance. This is surely a disappointing figure to the proponents of IT governance especially when one considers that IT governance does increase shareholder value. From observations on the timeline, it would



appear that many organisations are just implementing IT governance in South Africa and that might explain why CIOs are the ones seen as being responsible for IT governance. It would be interesting to see how future surveys would show on this particular question.

Popular Frameworks

The findings in the 2006 survey about standards used indicate that there are three popular frameworks in South Africa with 57 percent of respondents indicating that they had implemented ISO 17799. 43 percent reported having implemented the CoBiT framework, and 42 percent of respondents reported that they have implemented ITIL. While there other organisations that have implemented other standards, the majority of organisations prefer these three.

The maturity of most organisations in South Africa is between level 1 and level 2 judging from the 2006 report.

2.7. ITGI – ITWeb

This section of the article contrasts and compares the global ITGI report to the ITWeb report.

2.7.1. Recognition

The glaring evidence from the two sets of data is that there is a huge percentage of recognition that IT governance is the solution to IT problems. The ITGI global survey found that over 82 percent of the respondents indicated that they believed IT governance to be the solution. The ITWeb had 80 percent of their respondents indicating that IT governance could be the solution for IT problems.

This similarity is not by chance. Most South African organisation's IT systems and infrastructure are up there with the rest of the world and the challenges of managing such systems are therefore similar.

Secondly, IT in most large South African enterprises like in the rest of the world are pervasively quite apart from just a while ago when IT was seen as an enabler of business. Now IT is not just an enabler but has taken a strategic business role of driving growth and revenue of organisations. In



both these surveys, it seems quite clear that IT has catapulted to a strategic role. Respondents are therefore agreeing to the fact that good IT governance is necessary to create structures in which the decisions about IT are made (Broadbent, 2004). Without these structures, it becomes difficult to get good decisions made consistently.

This is so critical because the culture in South Africa shows that you tend to get line of business managers who will walk into the IT department, smile nicely to the IT manager and say could you please help me with this project because I need it urgently? The problem for IT manager becomes how to deal with such requests. If he does not have a structure in which to make decisions and even more if he does not know where the demand for his IT resources are coming from, it becomes very difficult to say no to such requests.

2.7.2. Actual implementation

One interesting observation in the two surveys was that while the percentage of respondents recognising IT governance as a solution was phenomenally high, the percentage of respondents who have actually implemented IT governance was much lower.

There are marginal differences in both surveys of organisations that reported that they have implemented IT governance. But while the ITGI global survey saw an 8 percent reduction from 25 percent to 17 percent of organisations that indicated that they have implemented IT governance, the ITWeb reported a marginal increase of 2 percent from 19 percent in their previous survey to 21 percent in this year's survey. However both surveys show a reduction in the number of organisation that reported that they are not considering implementing IT governance. The ITGI global study shows a reduction from 42 percent to 36 percent when compared to a reduction of 20 percent to 15 percent in the ITWeb survey.

This indicates that more companies are beginning to understand the importance of governing IT in their businesses but sadly the level of commitment to actually implementing it is still slow. To ensure the success



of corporate IT governance initiatives IT executives need to involve business leaders in the decision making processes and on committees. Management buy in is essential for any IT-related project to get off the ground. Most IT related initiatives fail because the project hasn't been aligned to the business, or the business has wrongly assumed it to be a purely IT driven initiative (Gupta, 2005)

Awareness and recognition are important but Weill and Ross (2004) found that companies with effective IT governance have profits that are 20 percent higher than other companies pursuing the same strategies. The ITWeb reported that 34 percent of the organisations surveyed were considering implementing IT governance compared to 22 percent reported by the ITGI global report. This again points to the fact that more and more organisations are beginning to realise that if they are to minimise IT risks get IT to deliver value to business there is a strong case to start governing IT.

2.7.3. Importance of IT to Business

The importance of IT to business is a reflection of the relevance and central role that IT has come to occupy in assisting business to become competitive, reduce time to market and achieve growth.

In the ITGI global survey, 87 percent of the respondents indicated that IT is quite important to very important for overall strategy delivery of the business while in the South African ITWeb survey, 90 percent of respondents said IT was important to the delivery of business strategy. According to Johnson (2006), the President of ITGI, of those who responded to the ITGI global survey in India, 84 percent deemed IT governance as very important and this figure came above the global average of 57 percent. This reveals some similarities between India and South Africa. Both these countries are playing catch up; moving away from an ad hoc management of IT to structured processes and procedures as businesses in these countries look to IT to be competitive.



2.7.4. Disconnect

While, 20 percent of respondents in the ITWeb survey indicated that there was a disconnection between IT and the business strategy, only 11 percent of respondents in India reported a disconnection between IT and the business strategy, compared with the global average of 29 percent (Johnson, 2006).

2.7.5. IT on Board Agenda

The ITGI global survey also found that IT governance appears on the board agenda in only 25 percent of the organisations surveyed compared to the ITWeb one which found that IT governance appears on board Agenda in only 26 percent of organisations surveyed. Both studies also reveal that CEOs are hesitant to discuss IT governance. Johnson (2006) says this finding is troubling because boards and CEOs are ultimately responsible for oversight over all major assets including IT. It can also be argued that boards and CIOs should in fact be begging for IT governance because apart from the fact that they are the custodians of all enterprise assets including IT, good IT governance can reduce risks, minimise cost and maximise the value delivered to shareholders. Instead, the ITGI global survey found that CIOs are responsible for IT governance in 33 percent of organisations, and nobody is responsible in 6 percent of organizations. The board must apply the same strategic focus to IT matters as they would to any other element of corporate strategy, such as acquisitions or product development. They must support the idea of IT as a strategic lever, and not merely as a cost centre (Freedman, 2005).

2.7.6. Responsibility for IT Governance

The ITWeb found a similar pattern but with the CIO taking responsibility in 41 percent of organisations surveyed compared to 33 percent of their colleagues around the world. The CEO taking responsibility over IT governance was an even lower number sitting at 18 percent while in 4 percent of those organisations studied by ITWeb, no one was taking responsibility for IT governance. This simply reveals that CIOs are the ones



with overall responsibility for IT governance world wide. Since IT governance specifies the decision making authority and accountability to encourage desirable behaviour in the use of IT, this means CIOs are the ones specifying those decisions. But Weill and Ross (2002) argue that decisions concerning the appropriate level of IT service need to be made by senior business managers. Left to their own devices, IT units are likely to opt for the highest levels of service providing a Cadillac service when a Buick will do because IT units will be judged on such things as how often the system goes down.

Weill and Ross (2004) further recommend that the board or CEO hold the CIO accountable for IT governance performance with some clear measures of success. This would encourage CIOs to create a group of senior business and IT managers to help design and implement IT governance. The action of the board or CEO to appoint and announce the CIO as accountable for IT governance performance, is an essential first step in raising the stakes for IT governance. Without that action, some CIOs cannot engage their senior management colleagues in IT governance. Currently however, there is sufficient evidence to say that CIOs around the world are responsible for taking IT governance decisions.

2.7.7. Popular frameworks

IT governance framework identifies all the processes needed to run an IT department, it measures the level of performance for each process according to desired company goals and provides steps to improve the processes (Teoh, 2006). A framework is able to help with analysis of the strategic and business value of every IT investment and can also help IT executives have a consistent and disciplined approach to the selection of projects. According to Guldentops (2006), IT governance frameworks are important not only to reduce or mitigate risks but also assurance that the objectives set out will be achieved.

In terms of popular frameworks, the ITWeb found that most South African organisations were using off the shelf frameworks. Predominately there are



three frameworks that are popular in South Africa with 43 percent of respondents indicating that they use ISO 17799; CoBiT and ITIL had 20 percent and 18 percent respectively. On the contrary, the ITGI global report stated that the majority of those who responded were using internally developed frameworks.

Thirty three percent of respondents to the ITGI Global survey indicated that they were using internally developed frameworks followed by those using ISO 9000 at 21 percent.

The ITGI global survey also reports that professional organisations solutions are third in line at 16 percent. The ISO 17799 which was rated highly in the ITWeb survey had a very low rating at 9 percent in the global survey.

This reveals that South African organisations have a higher propensity for opting for already developed frameworks than their colleagues. The huge shortage of skills in IT is one of the reasons organisations in South Africa might prefer to pick off the shelf frameworks. It also explains why there is a concentration of few frameworks because the wider the framework a country has, the wider the skills set that country needs. This implies that it is easier and cheaper to find an ITIL trained person South Africa than a Six sigma trained person. The important revelation though, is that both surveys found use of frameworks being used to assign decision-making.

As Hill (2006) put it, the goal of a governance framework is to provide a common language to facilitate communication between IT and the business, and which can also facilitate the mapping between the governance structures and process models themselves.

2.7.8. Maturity Level

The ITGI global survey further reports that almost 60 percent of their respondents had a maturity level of 2 and below, and an impressive figure of 38 percent was recorded as having maturity level of 3 and above. The ITWeb had over 85 percent of their respondents indicating that their



maturity level was between level 1 and 2. Out of the 625 respondents in the ITGI global survey, only 4 percent indicated that their maturity level was at level 5. None of the respondents in the ITWeb survey reported a maturity of level 5. This indicates that most South African organisations rated on a capability maturity model have only reached a stage where their processes are repeatable compared to the global organisations which reported that 38 percent of their processes were not just repeatable but defined, managed and optimised. The basic principle of such a maturity measurement is that an organisation can move to a higher maturity only when all conditions described in the higher maturity level are fulfilled.

Management can use this tool to obtain a quick self-assessment or reference in conjunction with an independent review. This defines the "as-is" position of the enterprise relative to IT control and governance maturity, and allows the enterprise to select an appropriate "to-be" level and, after analysis of the gaps, develop a strategy for improvement (Guldentops, Van Grembergen and De Haes, 2002). Does this then mean that South African organisations should be aiming for higher levels? Hill (2006) disagrees. Many organisations are being advised to do a gap analysis of their maturity and then strive to reach international standards. The important thing, he says is to recognise and deliver what the business wants and not where you need to be in terms of standards. You could end up building a lot of capability which the business will never ever need (Hill, 2006). CIOs therefore, should make sure that capability maturity has a business focus and not a standards focus.

Organisations working to achieve level 5 maturity must be sure that the capability so acquired will help the business achieve its objectives. The important point here therefore is that organisations should adopt levels of maturity in their processes that help them deliver a quality product or service to their customers, matching the maturity levels with the demands placed on the organisation by their customers.



2.8. Conclusion

Corporate governance is the system by which companies are directed and controlled. Similarly IT governance which is part of the overall corporate governance is a system by which organisations can direct and control IT. Organisations are increasingly depending on IT not only to support critical business functions and processes but also to leverage IT to gain competitive advantage and innovate quality new products and services for their customers.

Therefore IT must be aligned to changing business needs to reduce risk, increase efficiency and value in its operations. This would require organisations to make improvements in the methodologies, frameworks that have been adopted and how to incorporate industry regulation in their organisations so that on a press of a button it can have visibility of whether it is complying to these regulations or not. The importance of IT to business success can no longer be questioned. That is why IT merits special focus from an organisation's top leadership in order to maximise the value and reduce risks associated with IT.

Effective IT governance takes care of all of this. IT governance provides a framework and structure that links IT resources and information to organisational goals.

The focus of this article was on comparing and contrasting the South African IT governance practices against the Global IT governance practices.

It is clear that South Africa takes governance issues very seriously as demonstrated by the King I and King II reports on corporate governance. As a matter of fact South Africa can take pride in that the Japanese version of corporate governance was translated from the King report.

Both the ITGI and the ITWeb saw improvements in certain practices of IT governance while in others the response showed that there is still a long way to go. For example both showed improvements in the number of times that IT appears on the board agenda and the fact that in both surveys respondents regarded IT as very important to their business strategy execution. Noted also are the differences in approach. While the South African respondents preferred off the shelf frameworks, respondents from the global survey preferred in house



developed frameworks; and while compliance was still a major driver of IT governance implementation in South Africa, the global survey reported that compliance was not a major driver like it used to be in the previous years. The reason for this could be that most organisations in the global survey were required by legislation to comply and spent a lot of effort to do so in the past two to three years.

However, the results show clearly that in terms of IT governance, South Africa is in line with most IT governance practices when compared to the global survey. There are, however, cases where South Africa is playing catch up to the rest of the world. This is not unusual when one looks at reports from other countries such as India that might be in the same category as South Africa. Practices of IT governance in India as reported by Johnson (2006), the President of ITGI, saw a similar pattern as those reported in South African.

It would be interesting to conduct further research on IT governance in South Africa. There exists opportunities for further research to find out for example about whether organisations that have implemented IT governance are able to sell their stocks at a premium in South Africa. Another area of research would be to find out whether IT governance practices can help organisations reduce the portion of budget spent on system maintenance and fire fighting and increase the portion of budget spent on innovation and enabling business improvements.

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