

*Full Length Research Paper*

# Implementation of regulation-based e-procurement in the Eastern Cape provincial administration

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The study focuses on e-procurement as government is currently in the process of transforming procurement practices in line with national economic strategy. In order to address various socio-economic challenges, government is turning to technology to address issues such as outdated procurement practices. E-procurement promises the introduction of internationally accepted best practices to help government deliver on its mandate to its constituency. An in-depth background of South African legislation that governs the procurement practices in line with National Economic Development Initiatives is sought to give an insight into this paper. The paper explores how best Eastern Cape Provincial Administration can succeed in achieving the national and provincial socio-economic growth objectives. Reports and other primary sources of data were consulted, and expert interviews were conducted to answer this question. It was found that measurable benefits of supply chain management have not yet been realized due to general limited understanding of how supply chain management concept works within government environment. Other limitations to mention but a few include lack of understanding in the implementation of policy and legal framework that govern procurement, obsolete, disparate procurement systems and ICT infrastructure.

**Key words:** E-procurement practices, e-government, supply chain management.

## INTRODUCTION

The modernisation of public sector procurement processes has the potential to bring about significant improved value for money from government spending. Through the appropriate deployment of e-procurement technologies, procurement processes can also serve as key drivers of e-business across the economy. The concept of e-government is commonly used to articulate this idea.

The philosophy of e-government, which includes e-business and e-service, is central to all the services that any government provides to its citizens. This research is concerned with a distinct, yet complementary, aspect of e-government, that is, the deployment of IT-enabled purchase and procurement processes for goods and services utilized in the fulfilment of public functions. In this context, this is referred to as e-procurement.

More importantly, however, is how an e-procurement process could be improved to enhance the wider goals of a government's mandate. This requires, therefore, a thorough investigation of the current regulation-based e-procurement system and its value in order to determine its potential benefits to the Eastern Cape Provincial Administration (ECPA). An important part of e-government is to focus on the delivery of faster and cheaper services and information to citizens, business partners, employees, other agencies, and government entities. The importance of this approach to e-government

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**Abbreviations:** ECPA, Eastern cape provincial administration; SCM, supply chain management; BBEEA, broad-based black economic empowerment act; ICT, information communication technology; ERP, enterprise resource planning; MDG, millennium development goal this idea.

is not questioned in this project. Instead, focus is shifted towards organizational management in the public sector, and how it manages its internal operations towards the attainment of cost-effective and efficient supply chain management (Anderson et al., 2003). The South African President's State of the nation address and the Minister of Finance's Budget Speech of 2005 asserted that effective and efficient public-procurement systems are essential for the achievement of the Millennium Development Goals (MDG) and the promotion of sustainable development. Government procurement systems are at the centre of the way public money is spent, since budgets get translated into services largely through the government's purchase of goods, works, and services. Unfortunately, procurement systems in many developing countries are particularly weak and serve to squander scarce resources. Strengthening procurement must involve a vital component of efforts to improve social and economic well-being and is a necessary feature of the commitment to reduce poverty (Chard and Hunja, 2005).

### **Statement of the problem**

The New Economic Reporting Format, issued by the national treasury to assist government departments and decision-makers to comply with the Public Finance Management Act (No 1 of 1991) or PFMA (Republic of South Africa, 1991), necessitates the use of e-procurement for purposes of accountability and proper recording of all government transactions. The primary focus of this paper is to answer the following question: How best can the Eastern Cape Provincial Administration (ECPA) succeed in meeting the national and provincial socio-economic growth objectives? The paper therefore, addresses the role e-procurement will play in developing strategic intent in order to assist the ECPA to become more efficient and effective through the improvement of processes. This will lead to the identification of factors that might ultimately promote the establishment of a successful e-procurement marketplace. The study also takes cognisance of the fact that achievement of a viable e-procurement requires a critical number of buyers, in the form of government organs, and suppliers, as well as effective technological infrastructure and process and workflow improvements. Supply Chain Management (SCM) is an integral part of procurement reform in South Africa. As an international commercial best practice, it has been adopted as a methodology toward effective, efficient and economic use of public resources in South Africa. Furthermore, the construct of supply chain management (SCM) is directly linked to preferential procurement for broad-based economic empowerment of historically disadvantaged people in South Africa. The concepts of both SCM and empowerment are interlinked in the policy expressions by the South African Government toward ensuring a better life for all.

### **BACKDROP OF THE SUPPLY CHAIN MANAGEMENT**

The concept of SCM was introduced in the public sector, in 2003, to guide uniformity in procurement reform processes in government. The introduction of an integrated SCM was intended to address the division between the outdated procurement processes in government that resulted in an inefficient procurement, contract management, and inventory and asset control system. (Policy to Guide Uniformity: Procurement Reform Processes in Government, 10 September 2003). SCM in the public sector is defined as an integral part of financial management that seeks to introduce internationally accepted best practices. It aims to bridge the gap between traditional methods of procuring goods and services and balance of the supply chain whilst addressing procurement related matters that are of strategic importance (Republic of South Africa, Green Paper, 1995). The Green paper on Public Sector Procurement, 1995 (Republic of South Africa, 1995), puts emphasis on increasing accessibility of historically disadvantaged small businesses to construction and engineering contracts as fertile ground for empowerment.

The desired output of these procurement reforms was to develop world class professional procurement policies and systems while ensuring the productive participation of previously disadvantaged persons in a manner that promotes entrepreneurship, and the adoption of best practice within all South African businesses while improving international competitiveness. The main purpose of the supply chain framework was to transform the public procurement process in the country, which is critical to ensuring growth and economic development by economic classification within the ambit of good governance. This is based on the notion that the public sector and local authorities have a major impact on the South African macro-economy in terms of consumption, investment and spending. As such, procurement has been utilized by government as a tool to achieve economic ideals, including certain socio-economic objectives (Republic of South Africa, Treasury Regulations, 5 March, 2005, Chapter 16A). The South African Constitution makes it very clear that the procurement system must be fair, equitable, transparent, competitive and cost effective. The Constitution, thus, refers to certain core principles, known as the "four pillars of world-class procurement", namely:

1. Value for money;
2. Open and effective competition;
3. Ethics and fair dealing;
4. Accountability and reporting (Republic of South Africa, Constitution of South Africa, Act No.108 of 1996).

In accordance with the RDP, SMMEs and HDIs need to play a bigger role in the economy. Greater participation in the economy and more diversified representation of

blacks and gender in the business ownership are essential to the gradual correction of imbalances of the past. The BBEEA deals with the need to integrate a coherent socio-economic process that directly contributes to the economic transformation of South Africa and brings about significant increases in the numbers of black people who manage, own and control the country's economy. It also sets out policies to significantly decrease income inequality (Republic of South Africa, Broad-Based Black Economic Empowerment Act No. 53 of 2003).

The Public Finance Management Act, 1999, Act No.1 (as amended by Act No. 29 of 1991) is one of the most important pieces of legislation passed by the first democratic government in South Africa. The Act promotes the objective of good financial management in order to maximise service delivery through the effective and efficient use of limited resources. One of the key objectives of the Act is to ensure the timely provision of quality information and eliminate the waste and corruption in the use of public assets. The PFMA establishes an accountability chain, in terms of which the accounting officer is responsible for inputs and outputs, while the politicians are responsible for the outcomes. As such the implementation of the PFMA is a major asset in the hands of the government. These regulations call for an open, fair and transparent procurement system in the interest of the common good of the country. The ECPA needs an effective public procurement policy that is fundamental to the success of a single market in achieving government objectives in order to generate sustainable long-term growth that creates jobs and fosters economic development (Green Paper for e-Commerce, 2001).

## **E-Government**

Electronic Government (e-government) can be viewed as a form of organisation that integrates the interactions between and among government and citizens, companies, customers, and public institutions through the application of modern information and communication technologies. E-government is therefore, considered as one of the critical components of making government more responsive and cost effective (Narayan and Nerurkar, 2006). E-government has the potential to provide better focus and access to customers, greater availability of information, improved business processes, and efficiencies. It could also improve the lives of ordinary citizens by delivering better government and better services to citizens and businesses, and streamlining the internal work of government. There is a need for a proper alignment of citizen needs with functions of the government departments (Kalakota and Robinson, 2002).

It is clear that the task of transforming the public service into well-oiled machinery is phenomenal. Therefore,

it requires efficient and effective service-delivery machine, which puts people first, thus ensuring that Batho Pele is a practical reality. It also requires the adoption of new paradigms of doing things differently, which is the fundamental cornerstone of service delivery improvement initiatives and ethos of the public service. This calls for a swift move from traditional procurement processes to automated procurement processes, through the adoption of an effective public procurement strategy in order to realize national and provincial economic growth policies.

## **Supply Chain Management (SCM)**

The management philosophy of Supply Chain Management (SCM) calls for organizations to go beyond traditional functional silos to include cross-functional disciplines and external entities which include customers and suppliers. According to the Policy Guideline for the Issuance of Supply Chain Management Framework in terms of Section 76 (4) (c) of the PFMA by the national treasury (Republic of South Africa, PFMA, 2002), SCM is integral to financial management as it seeks to breach the gap between traditional methods of procuring goods and services and the balance of the supply chain while simultaneously addressing procurement issues of strategic importance. The process of SCM has four functional areas, namely; demand management, acquisition management, logistics management and disposal management. SCM is a collaborative strategy, which aims to integrate procurement and provisioning processes, by eliminating non-value added cost, time and activities to competitively serve end customers, like the Eastern Cape Provincial Administration (ECPA), better.

## **EASTERN CAPE PROVINCIAL ADMINISTRATION (ECPA) BUSINESS DRIVERS**

With the changing customer expectations, government's new policies and priority changes have caused the departments to rethink and adjust their mission and goals in line with the following strategies (The Province of the Eastern Cape, 2009):

1. Government Batho Pele Principles (Transparent Governance).
2. Total quality management and reduced total cost of ownership.
3. Provincial growth and development strategy.
4. Bringing the historical disadvantaged individuals into mainstream economic activities.
5. Rapid rates on innovation in customer, internal, and supplier facing processes.
6. Integration of offline and online processes.

The above ECPA business drivers demand effectiveness

and responsiveness of government through:

1. Increasing efficiency of government bodies (for example, automation of tasks and procedures);
2. Greater information sharing between public government bodies and integration of services;
3. Providing new and improved public services;
4. Greater transparency and accountability at all levels;
5. Improve efficiency of slow, labour-intensive, manual processes;
6. Compliance with regulations.

Information Communication Technologies (ICTs) are now accepted as the driver of socio-economic well being of our societies in our time and in future. It is therefore, critical to harness power to empower societies to exploit ICTs for self development. This is especially true for a developing country like South Africa that often lacks the necessary infrastructure and has policies that hinder ICT growth. Eastern Cape Province is characterised by wide disparities of ICT availability based on gender, geographical location, capacity to pay and high levels of IT literacy among others. Without addressing these concerns, societies in the rural underdeveloped areas will miss out in the information revolution which provides opportunities for growth.

Ultimately, all decisions in government environment technology are affected by the political environment. Politicians can delay or even stop certain technology areas such as outsourcing and privacy and they are subject to greater scrutiny by political bodies. Against this background, the business environment in government is different from private sector environment in terms of operations and decision making processes (Sogoni, 2009). This is so because business decisions in government environment are heavily regulated and influenced by politics. Currently, ECPA procurement systems have a heavy slant on manual paper generation, though there are systems like BAS and LOGIS to support the effort (The province of the Eastern Cape, 2009). It is important that the different public sector entities reduce the number of ICT-solutions involved in their procurement activities and cater for interoperability. Multiple system solutions without focus on interoperability will give the suppliers implementation and integration challenges and increase the cost of handling public sector customers (Sogoni, 2009).

### **Status of information technology infrastructure**

Eastern Cape Provincial Administration (ECPA) Information Technology (IT) infrastructure is limited to the departments and their district offices. The rest of the province is characterised by lack or poor technical infrastructure and electricity, especially in the remote rural areas where there is impediments to information. This

infrastructure is the foundation on which the others are built on. However, as the provinces move along the time-line, investment in infrastructure will increasingly be justified on the strategic value to economic growth. Thus, content and its applications will increasingly be the justification for infrastructure deployment.

The current existing procurement systems are limited in executing legislative requirements for complying with the regulatory frameworks that govern procurement practices. Consequently, the departments are repeatedly audited and they qualify on the same issues like unauthorised expenditure, over expenditure and under expenditure (Auditor General Report, 2005). The potential of electronic procurement arises from the benefits derived from interoperability, which is determined by standards and connectivity, and is a function of infrastructure. For developing remote communities like the Eastern Cape, connectivity and related variables of bandwidth and reliability can be principal hurdles to electronic procurement. The current Information Technology network infrastructure foot print is very limited in the rural areas. The lack of provincial procurement strategy also impact negatively on the high level strategic product planning for the ECPA. There is no guiding provincial procurement targets set that inform the targeted spending on the designated groups by the departments.

For example, each department has its own supplier database, which influences the classification of suppliers by services and goods offerings available in the province. This situation can lead to non-compliance to the procurement regulations with special reference to PPPFA and BBBEE prescripts. Further, many departments are repeatedly getting qualified audit reports with matter of emphasis on poor asset management, over expenditure, and mostly under-expenditure (Auditor General Report, 2003-2004). This is made worse by the following additional threats:

1. Poor IT literacy levels within the emerging supplier industry;
2. Resistance to change;
3. Internet culture development/transformation;
4. Internet reliability, speed and security;
5. Scalable bandwidth and connectivity.

### **Key issues and challenges**

It is thus, evident that the public sector procurement is overly dependent on process and procedure. The main issues and challenges facing the ECPA procurement are found to be the following:

1. Procurement has been used to provide indirect assistance to small, medium and micro enterprises, although tracking of the impact is inconclusive;

2. The procurement system is highly prescriptive and is focussed on compliance with procedures;
3. The objective of achieving 'value for money' is often confused with approving a tender with the lowest price;
4. There does not seem to be an indication that the procurement process is cost effective;
5. There does not appear to be data on the use made of the money saved through the present procurement system.
6. Departments generally suffer from a lack of capacity in their SCM Units. As a result, delays are experienced with the awarding of contracts, which impacts negatively on service delivery.
7. A high vacancy rate in most SCM sections throughout departments.
8. Serious lack of skills among SCM practitioners.
9. Bid committee members need further training. Their attendance at meetings is poor.
10. Poor communication between SCM unit and CFO causes delays and poor administration.
11. General poor procurement planning results in goods and services not being available when they are needed.
12. Lack of timeous and accurate reporting of SCM information.
13. Poor contract management.

Poor ICT infrastructure in the whole ECPG leads to an uninformed, poor information society as evidenced by long purchase cycle times due to manual procurement systems currently been used. The tendering/bidding timeframes tend to be too long due to limited access to information by the prospective suppliers/bidders timeously.

### **Preferred future state**

The key motivational factor for change to a preferred state is to reduce costs of doing business, increase efficiency in service delivery, and promote procurement pillars (for example, value for money, ethics and fair dealings, competition and transparency, accountability, reporting and equity). The strategic focus of the ECPA business model for change at an organizational level is set:

1. To provide technological infrastructure that serves as a vehicle for enhancing government service delivery to citizens through the implementation of digital inclusion programme of action.
2. Through the adoption of an enabling environment based on widely available internet access, the ECPA seek to stimulate private sector investment, foster new applications, content development and engage in public/private partnerships.
3. Provide training assistance to SMMEs in ICT industry, transport industry, roads construction industry, and construction industry in stimulating economic growth and

job creation as an element of a provincial strategy to reduce poverty through wealth creation.

4. Through the use of an electronic procurement system, electronic tender creation, automated dissemination of contract details, automated adjudication, and automated contract award processes will reduce the traditional tendering processes by more than 50%.
5. The use of a web and enterprise resource service based supplier interface the capability to entrench governance, policy and sourcing philosophy.
6. Fully utilize customer's spatial data to assess economic conditions to direct/prioritize resources and services to the neediest communities in terms of job creation and economic development.
7. Manage relationships with suppliers. This cooperation will strengthen partnership between government and citizens to drive the economic growth and development in the Province.

The new ECPA business model should bring cost savings and improved customer service that will facilitate service delivery improvement to the public within the Province. To achieve this, there should be synergy between the business strategy, enterprise applications and technology to create a simple digital solution to solve business problems. This should be complemented by a solid proven facilitating services infrastructure which consists of: Online transactions, Web database application servers, Technology Infrastructure.

The astounding growth rates of internet use, forces the ECPA to rethink its traditional business model. E-procurement challenge is a strategic business issue, not just one more technical issue, but changing the inward looking reengineered business processes to outward-facing process reengineering (Gartner, 2007). This has a potential to affect every aspect of the organization's internal value chain. This implies that the electronic applications should be placed in the proper business context and the online strategy aligned with the business' overall strategy. Therefore, the new business model is necessary to integrate the online initiatives with core business goals. This calls for new business paradigms that fully embrace the e-procurement /commerce philosophy, including a new view of the value chain. The ECPA has to adopt an Online Procurement Strategy in order to turn around the status of procurement process in the involved province that include but are not limited to the following objectives:

- a) To provide greater transparency in compliance with government acts;
- b) To create efficiencies through streamlining and automation of purchasing processes;
- c) To reduce processing costs of doing business;
- d) To provide better product and pricing choice;
- e) To achieve efficient use of resources, better quality purchases, increased budget savings;
- f) To reduce transport cost of accessing government

services and tender information;

g) To reduce payment cycle through the use of internet procurement system;

h) Improved relationships with service providers, which will result in:

1. Improved internal efficiencies

i) Reduce costs of operation

ii) Improve time to deliver services iii)

Improved supply chain efficiencies

2. Improved customer satisfaction.

These objectives will address the gaps identified in the current status of procurement practices in the Eastern Cape Provincial Administration. The main goal is to provide a comprehensive, consolidated business solution that will successfully encompass the entire departments' cost areas while also augmenting their existing accounting, financial planning, and human resources systems. This will ensure that significant cost benefits that accrue from comprehensive e-procurement strategy are addressed. Also the introduction of electronic public procurement tool will attain a critical user mass of electronic public procurement to facilitate economic growth, economies of scale, BBEE and PPPFA targets.

The model is based on a premise that there would be concerted and collaboration efforts from the government, public and business (G2C and G2B) where government would persuade citizens and businesses to use the portal whilst a change management effort within the organization is embarked on. Successful implementation of this model needs a secure, scalable information technology infrastructure and an e-procurement solution that are able to integrate seamlessly with existing systems and technologies. The ultimate goal is geared toward achievement of the e-procurement value creation as highlighted in Figure 1. The promotion of SME/BEE development in terms of the constitution and regulatory framework, most notably the PPPFA and PFMA, points towards the need to use procurement as an instrument of economic empowerment. Increasing transparency to markets (vendors) and customers are also called for.

By becoming more business oriented, ECPA will be able to channel more resources into BEE development which is key to addressing the requirements of the constitution, PFMA and supply chain regulations. This calls for an ECPA procurement mission that is geared towards building a team of procurement professionals, both socially conscious and driven by customer satisfaction, using simple standardised processes, enabled by state of the art technology to achieve continuous improvement in delivery of goods and services to Eastern Cape Province customers. The core challenges facing the ECPA are to improve overall service-delivery performance, corporate agility and responsiveness to customer needs, while simultaneously improving consistency of operations and information management. Within its core

business, the ECPA customers' needs are growing even more complex, particularly for both collaborative procurement processes and information access to government services on line.

## RESEARCH METHODS

The research methods followed were qualitative studies (Mouton, 2001) to determine the status and extent of implementation of regulation-based e-procurement in the ECPA. Investigations were conducted through:

(a) A literature review

(b) Personal surveys

(c) Stake-holder analysis

The research was conducted specifically to identify existing challenges and the gaps in the current status of procurement practices in the ECPA. The main goal is to provide a comprehensive, consolidated e-procurement business solution that successfully encompasses the entire departments' cost areas while also augmenting their existing accounting, financial planning, and human resources systems. Analysis and interpretation of recent research results regarding the impact of e-commerce and e-procurement were performed to ensure that significant cost benefits that accrue from comprehensive e-procurement strategy are addressed.

## Participants

The target stakeholder groups for the survey are the following:

1. Audit and compliance sector (Governance)

2. Procurement practitioners (SCM Staff)

3. Financial management

4. System implementers (Finance and SCM Units)

5. First tier suppliers (Construction Industry: Well Established Business Contractors)

6. SMME and BBE (Industry: Second Tier Business Sub-Contractors)

7. Chairpersons of the Provincial Economic and Infrastructure Development Cluster.

There were 52 respondents who took part in this study.

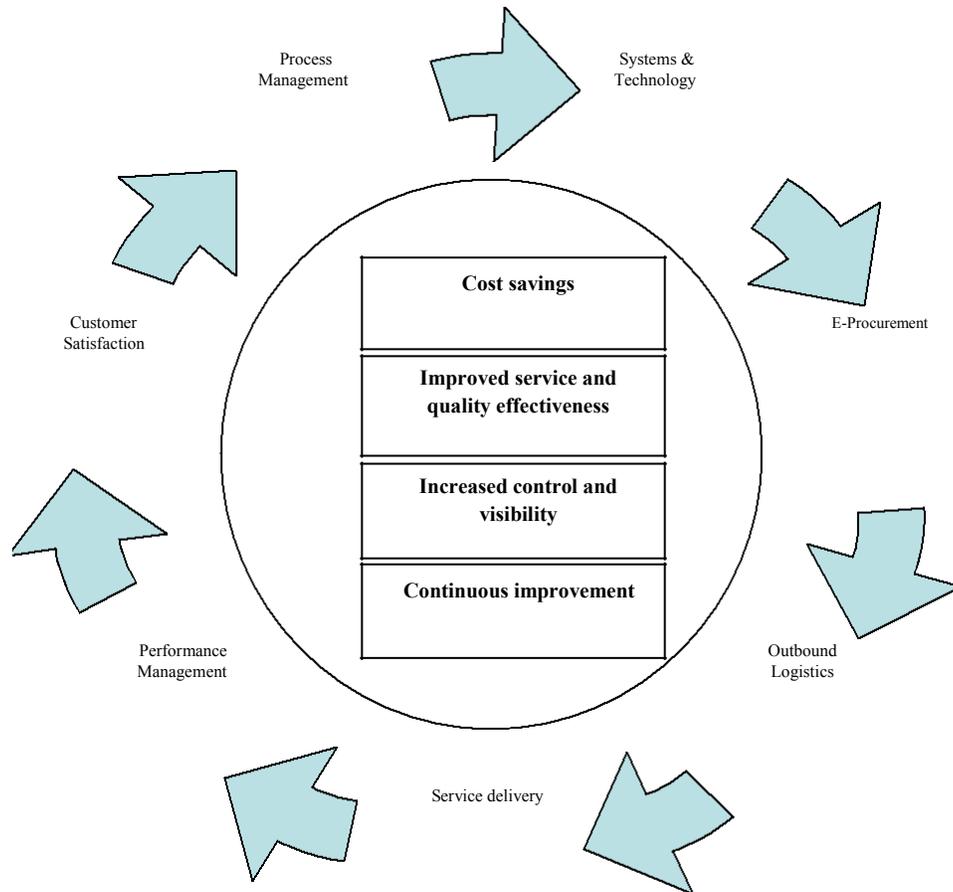
## FINDINGS

The new process design was based on the analysis results and the identification of problematic areas that could be improved by the introduction of an electronic system. The most important findings are summarised in Table 1. Based on the findings presented above, new process charts and descriptions were developed. The purpose of the new process design is to improve the identified problematic areas. A summary of key points that needs to be introduced by the new process is as follows:

1. Single location filing;

2. Electronic document flow and control;

3. Document standardisation and simplification;



**Figure 1.** E-procurement value creation adapted from supply chain management framework.

4. Rationalisation of the number of documents used;
6. Extinction of non-value-added activities in cases where there are no legal constraints;
7. IT support for most of the activities.

The design of the re-engineered process followed the conservative scenario after strategic decisions of the national treasury were taken to minimise the organisational changes and to recognise the need for modification of the existing legal framework. Such changes include the abolition of state tender boards, the appointments of chief financial officers as chairpersons of the bid adjudication committee and the introduction of SCM units in all government departments under the chief financial officers. Based on the ECPA experiences thus far, it seems that the lack of general knowledge and competence in procurement as such are major challenges that need to be addressed by an electronic public-procurement initiative (Sogoni, 2009). This may also be the case in the follow-up of the action plan for the implementation of the legal framework for electronic public procurement. Government departments have too much of their focus on the legal aspects when entering into agreements with suppliers. Instead of saving their

organizations a lot of money through favourable contracts as intended, they end up with a very costly way of repeatedly doing business with the same suppliers and in the same way as in previous years.

In order to deliver on the broad political imperatives highlighted in the PGDP, the ECPA needs to use its scarce resources, both financial and human, in the procurement area more effectively. By becoming more business-orientated, the ECPA will be able to channel more resources into BEE development. The following changes were identified, whereby effectiveness and efficiency will be achieved, namely:

1. The implementation of an overall procurement strategy, including a BEE framework;
2. Eliminating duplication of procurement-support functions throughout the ECPA;
3. Realization of benefits of bulk buying, pooling of efforts and economies of scale;
4. Improving process efficiency based on standardisation and simplification;
5. Implementing an Enterprise Resource Planning (ERP) system as an enabling new technology, with its added potential to streamline processes;

**Table 1.** Findings on specific issues in the ECPA procurement processes.

Issue	Finding
Lead times for bidding processes	<p>Specification (crafting, evaluation by committee, and approval by the accounting officer or delegated authority) = 30 days</p> <p>Advertisement of bid specification = 30 days</p> <p>Evaluation and adjudication of bids = 60 days from the date of the bid closure</p> <p>IBAC if above the departmental threshold value = 2 weeks</p> <p>Approval by Accounting Officer = 5 days</p> <p>Signing of service level agreement = 10 days before the contract is executed.</p>
The bid lead times are too long	<p>A large percentage of the delay is due to idle time between the activities of the processes. In particular:</p> <p>The lead time in the case of the open procedure procurement is three to six months depending to the complexity of the project (average value from &gt; 200 000 up to 400 million). In addition the process steps have to be followed to comply with the current legislation (PPPFA).</p> <p>The lead time in the case of the restricted procedure procurement is three to six months (average value &gt; 200 000 to 300 million). In this case, proposals are made public and then evaluated. Only then are pre-selected suppliers are allowed to participate.</p> <p>The maximum values of the procurement process (both of the open and the restricted procedures) extend to one years' time. This mostly applies to the construction industry.</p>
Sub-processes	<p>The sub-processes acting as bottlenecks in the process are the following:</p> <p>The Interim Bid Adjudication Committee (IBAC) which accounts for 11% of the total bid time (95 days) in the open procedure procurement.</p> <p>The pre-selection of suppliers who are invited to submitting proposals accounts for 63 % of the total bid time in the restricted procedure procurement. The legislation forces to check the market before the restricted procurement procedure can be followed.</p>
Procurement activities within sub-processes	<p>A large number of activities have been identified (42 activities in total) due to the bureaucratic procedures. A high percentage of the activities involve non-value-adding work (bid adjudication, and IBAC).</p> <p>Twenty different document types (ECBD forms) are traced in the process. This number could be substantially smaller in the case of documents' standardisation. The document transactions appear to be very high. The most striking findings in this area were the following:</p> <p>Twenty (ECBD) documents (R3000, 00) per bid are used internally and externally in each tender/bid process.</p> <p>One hundred and sixty-five thousand documents (average value) are used for all the yearly tenders. [Assumption: 50 projects * no. departments* cost /bid].</p> <p>A very small percentage of activities are supported by IT. Most of the activities are carried out manually, which poses a great challenge, and are prone to human error, which can be costly and cause more delays when challenged by suppliers resulting into litigation.</p>

6. Reduced stock holding and reduced wastage throughout the shared supply chain.

**RECOMMENDATIONS**

Based on the above findings the following recommendations can be made to the ECPA:

**The provincial procurement strategy**

Within the ECPA Procurement Strategic Plan, special

emphasis should be placed on vendor management and BEE/SME development. This initiative will show commitment by the ECPA to become the leader in affirmative procurement within the public sector within the next five years. The ECPA e-procurement initiative must be approved by the Provincial Cabinet. Political buy-in is very crucial for the success of this initiative. This should be organized as an e-procurement innovation under the Provincial Ministry of Finance. The direction for the future work on electronic public procurement should be charted in the Provincial Procurement Strategy document and actions for the use of electronic business processes and

electronic procurement in the public sector. Adoption of the following main strategies for implementing e-commerce and e-business in the ECPA is suggested:

1. Good and predictable legal and economic framework conditions as prescribed in the Provincial SCM Framework, PGDP, PPPFA, BBBEE, EPWP to mention a few.
2. Open ICT infrastructure and services.
3. A sufficient number of users, that is, through public procurement.
4. Competent, knowledgeable and insightful SCM staff.
5. Provision of active consideration to social and public interests.

The ultimate goal of this initiative should be to move the ECPA to the forefront of developments in e-commerce and e-business. This will provide socio-economic benefits and enhance development of a competitive new branch of procurement in the ECPA. At the same time, fundamental values and socio-economic considerations should be stressed in order to prevent undesirable results. The electronic public-procurement initiative should also contribute to an increase in overall procurement competence in the public sector. Furthermore, the initiative should help the public entities develop their negotiating and business skills to become a more professional and demanding customer, in order to achieve better terms/value for money from their relations with suppliers.

Procurement structure and processes should include re-allocating responsibilities for procurement activities between departments and the ECPA to ensure delivery against the following change drivers:

1. Eliminating duplication of procurement-support functions throughout the ECPA.
2. Commodity teams at the ECPA will develop and implement sourcing strategies, incorporating BEE spend targets; these teams will also oversee the procurement of products and services for the departments to ensure delivery against the following two change drivers, namely:
  - i. The implementation of an overall procurement strategy;
  - ii. Benefits of bulk buying, pooling of efforts and economies of scale.

### **A single database**

A development of a single supplier database for the province, where the suppliers are categorised by the types of services and goods they are offering, will allow for effective strategic sourcing. From this centralised database, preferred suppliers will be determined to shorten procurement cycles. The strategic sourcing team will facilitate various value teams, in which users will participate and these value teams will investigate specific

commodities of strategic importance to the province. The market research unit will support by looking at the market conditions, including empowerment opportunities in the relevant market sectors. Pre-qualification of vendors and the creation of vendor and product databases should be implemented at the ECPA as this will contribute towards the execution of the BEE framework, its implementation being part of one of the change drivers. The lack of sufficient opportunities for SME producers to enter into economic activity necessitates the commoditization of goods and services. These must be packed and awarded to the designated groups for at least six months to a year for sustainability. The ECPA's procurement programme will have to focus on enablement, by putting short-term contracts in place for pre-agreed high-value, high-volume items in terms of the Enablement Plan. An automated on-line system is needed that allows suppliers real-time access for handling quotations, orders, goods receipts and invoices. This will result in price reductions in operations-related procurement expenditures.

### **An open-standard, web-based e-procurement solution**

In order to handle large numbers of buyers and suppliers, an effective and easy way to distribute ICT-solution is needed. This should be an open-standard, web-based e-procurement solution, for both public sector buyers and their suppliers in the private sector. Such a solution would also eliminate the problem of being too tightly linked to the supplier's web shops and/or ordering technologies. For the public sector, it is essential to be able to replace technology and/or suppliers without big cost and long time-frames. A key objective will be to provide strategic information to enable policy makers, investors, service providers of all categories, consumers and development partners make informed decisions cost effectively, taking into account appropriate technologies, market dynamics, regulatory moves, etc. If the above recommendations are followed value propositions will be realized as summarized in Figure 2.

### **SUMMARY AND CONCLUSION**

The ECPA has to establish a fully operational tool for electronic public procurement. The Eastern Cape Public E-procurement Initiative has to be approved by the cabinet. This initiative must be organized as an e-procurement secretariat under the Ministry of Finance. The direction for the future work on electronic public procurement must be in the Provincial Procurement Strategy Document in line with the legal procurement framework of South African Government. SCM systems must be designed to enhance open and rapid communication and sharing of information across the supply chain

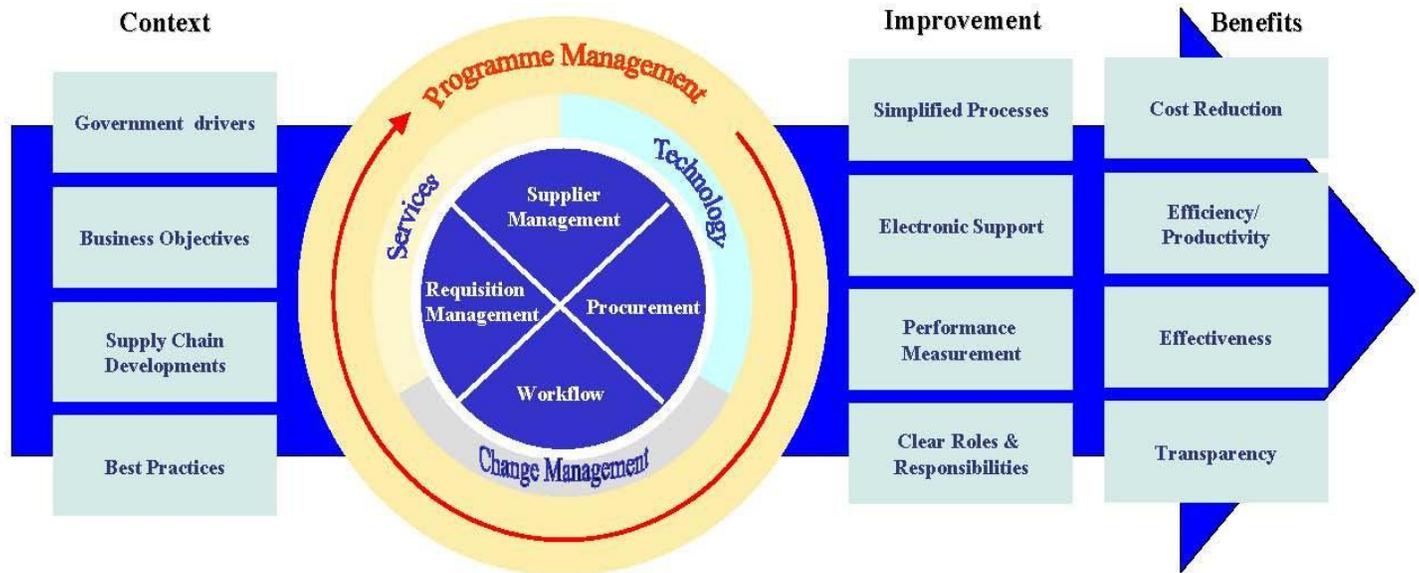


Figure 2. E-Procurement Expected Benefits Model (Panayiotou et al., 2004).

and within the government. Clear roles and responsibilities of all role players in the supply chain should be defined. The appropriate use of IT can also eliminate duplication of data and provide real-time information. It also allows the organisation members to view themselves in the context of their larger mission and goals. Information technology has become a powerful tool to enable enhanced service delivery in both the public and private sectors. Getting IT right is becoming more critical than ever for governments in meeting the demands of citizens, businesses, and employees, who are expecting the same high level of service they are receiving from commercial ventures. Information technology (IT) is a utility, and how the study manage it can dramatically impact on the efficiency, effectiveness, and citizen-centric focus of government services and programs. An agile ICT-wide area network infrastructure that covers its rural spread throughout the Eastern Cape Province is required. This should provide network with a foot- print that is accessible to all the emerging SMMEs. The next step is the selection of a technology that will successfully provide the defined functional requirements. The successful implementation of such a demanding program will result in a workflow, long-term efficiency, governmental purchasing effectiveness and cost reductions leading to a reduced cost burden on the public.

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